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MANAGEMENT OF MEDICAL PROBLEMS RESULTING FROM POPULATION RELOCATION

Volume II

THIS REPORT IS PART OF A SERIES OF DOCUMENTS WHICH PROVIDES BASIC PLANNING GUIDANCE AND RESOURCE DATA TO DCPA AND STATE PERSONNEL IN DEVELOPING PLANS FOR NUCLEAR CIVIL PROTECTION.

**DEPARTMENT OF DEFENSE
DEFENSE CIVIL PREPAREDNESS AGENCY**

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Management of Medical Problems Resulting from

Population Relocation

by

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Preface

This report was prepared as a part of a research program being conducted by the Defense Civil Preparedness Agency (DCPA) to evaluate crisis relocation as a strategy for protecting populations threatened by large-scale disasters. Prepared under contract DCPA-74-C-0285, the research objectives were:

- 1) to define the health and medical (h/m) problems associated with crisis relocation,
- 2) to identify various alternative methods of coping with the anticipated h/m problems,
- 3) to prepare guidelines for preparation of the h/m component of a crisis relocation plan (CPR),
- 4) to complete prototype plans for CPR in the State of Colorado, its host and risk areas,
- 5) to test the plans in Colorado and other suitable areas, and
- 6) to investigate other related problem areas.

The report is presented in two volumes:

Volume I: Part One – Analytical Report

Volume II: Part Two – Health and Medical Guidance for Crisis Relocation Planners
Part Three – Prototype Plans

Part One, the Analytical Report, provides a medical profile of the United States which identifies the day-to-day h/m problems of the population; examines the h/m problems that might be expected to result from population

relocation; sets forth essential h/m functions for crisis relocation; and discuss resources and systems to meet h/m needs during a relocation period.

Part Two, Health and Medical Guidance for Crisis Relocation Planners, identifies the general requirements for h/m services during crisis relocation, presents alternative solutions for the planner's consideration, and includes selected planning aids.

Part Three, Prototype Plans, includes H/M Service Annexes to crisis relocation plans for the State of Colorado, El Paso County-Colorado Springs, and Fremont County; state, risk, and host jurisdictions, respectively.

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ABSTACT

This report describes research on the management of medical problems resulting from the relocation of populations from likely target (risk) areas to lower-risk (host) areas. The research suggests that the health and medical(h/m) problems of a relocated population will likely be those that are normally present in a population, plus a set of problems due to relocation itself. Thus, a relocated population will experience the usual number of acute and chronic conditions, some of which require professional attention. But, in addition, it is believed that there may be increased numbers of stress-induced problems such as premature births, emotional crisis, and exacerbations of metabolic disorders; and outbreaks of communicable diseases should congregate care facilities become overcrowded and sanitary levels decline. An additional problem is that of the “hard-core” patient too ill or too severely injured to be moved to a host area. “Hard-core” illnesses include both organic and psychiatric disorders.

Underlying the management of these problems is the fact that relocation will disrupt the normal consumer-provider relationships in health services. The effects of the disruption will be most acute in host areas where the resident h/m resources would be overwhelmed by the relocation population if no additional resources were provided. In the risk area, the problem is comparatively simple, since the h/m resources are large in relation to the number of “hard-core” patients and critical workers for whom h/m services are to be provided.

In addition to an analytical report of research findings, prototype h/m annexes to crisis relocation plans for state, risk, and host areas were prepared and field tested in Colorado, Arizona, and New York.

This report consists of two volumes. Volume I contains Part One, The Analytical Report, which provides a medical profile of the United States; identifies the day-to-day h/m problems of the population; examines the h/m problems that might be expected to result from population relocation; sets forth essential h/m functions for crisis relocation; and discusses resources and systems to meet h/m needs during a relocation period.

Volume II, Part Two, Health and Medical Guidance for Crisis Relocation Planners, identifies the general requirements for h/m services during crisis relocation, presents alternative solutions for the planner's consideration, and includes selected planning aids.

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Part Two

HEALTH AND MEDICAL GUIDANCE FOR CRISIS RELOCATION PLANNERS

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PART TWO

HEALTH AND MEDICAL GUIDANCE FOR CRISIS RELOCATION PLANNERS

PART TWO

HEALTH AND MEDICAL GUIDANCE FOR CRISIS RELOCATION PLANNERS

A. Introduction

This document contains guidance for the use of host and risk area crisis relocation planners in developing plans to provide austere health and medical (h/m) services for evacuating and/or host area populations. Although there may be differences of emphasis and timing, the basic responsibilities of both the host and risk areas are the same. The guidance identifies certain potential h/m problems and suggests alternative solutions for the planner's consideration. The evaluation of h/m resources is considered. A list of essential h/m functions is included for consideration by the planner and interfaces with other services are identified. An action checklist allows the h/m planner to quickly check to see that all things are in an appropriate state of readiness. Example h/m service Plans are included as Part Three of this volume. To prevent the guidelines from becoming too cumbersome, tables and detailed discussions have been relegated to appendixes. A special effort was made to avoid dictating strict procedures to the planner, thereby limiting the applicability and usefulness of the guidance.

Figure 1 illustrates the sequence of steps involved in the preparation of a h/m annex to a crisis relocation plan (CRP).

B. Mission

A Statement of the h/m service mission should appear first in the h/m annex. The mission statement sets forth the overall objective of the

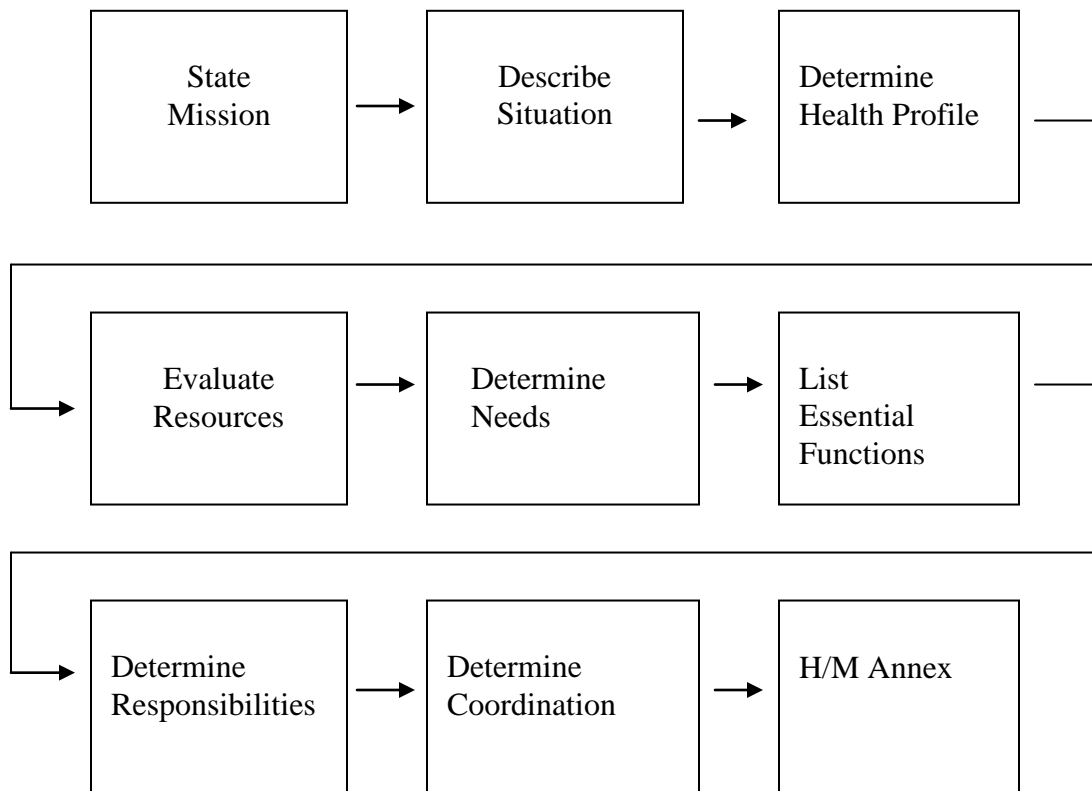


Figure 1.
Steps in Preparing
H/M Service Annex

h/m service. It is likely that the mission statement will be the same for the host and evaluating jurisdictions; only the emphasis given various parts of the mission will vary. Objectives which would appear to be common to all h/m annexes include the following:

- 1) provision of primary and emergency medical care to the ill and injured,
- 2) provision of environmental sanitation measures and other essential public health services, and
- 3) provision for the interment of the dead and other related services.

Although it is believed that the objectives listed above are applicable to any community, the h/m planner may find it necessary to add objectives and/or specify the foregoing objectives in a more definitive manner. Examples of mission statements may be found in Part Three of this volume.

C. Situation

A description of the situation in which crisis relocation may take place is a key part of the h/m annex. The situation statement will provide the reader with some insight into the assumptions on which the annex is based. The situation statement should include the following items:

- 1) a statement that the plans are applicable to either nuclear or natural disasters, or both;
- 2) the authority for ordering relocation of a population;

- 3) a discussion of the time allotted for the evacuation of risk areas, and the anticipated duration of the relocation period (the time that the evacuating population spends in the host area);
- 4) a definition of the population affected by crisis relocation, including numbers of people and their location;
- 5) a discussion of relocation assignments for the evacuating population when appropriate;
- 6) a discussion of any special population segments, such as military or essential workers, and their relocation assignments;
- 7) a discussion of areas requiring h/m services; and
- 8) recognition of local circumstances requiring special planning consideration.

The items listed above are considered to be the minimum requirement for a situation statement; the planner may wish to develop a more detailed list. The situation statement, of course, can be modified at any point in the preparation of the h/m annex. Examples of situation statements can be found in Part Three of this volume.

D. Health Profile

A key step in the development of h/m plans for CRP is the evaluation of the health status or profile of the population. The health profile will identify diseases and/or conditions in the population prior to relocation, i.e., a base level. In both the host and evacuating jurisdictions, the profile may serve as the basis for planning h/m support for relocated populations. The profile should include both the hospitalized and nonhospitalized populations. The planner in each community should determine the local health status using data compiled by local and state health departments and local hospitals, if available. If local data are not readily available, data for the U.S., presented in Appendix 1, can be used as a guide. To facilitate their use, U.S. data are presented as rates (e.g., as heart conditions per 1000 persons) or percentages. Data on the expected incidence of acute conditions and the prevalence of chronic conditions in various sized populations are also given in Appendix 1.

1. “Hard-core” Patients

Faced with an impending crisis, the discharge rate of hospital patients (normally about 10 percent a day) can be increased to about 15 percent a day. A majority of hospital patients can be discharged within a few days. However, a certain portion of the patients cannot be discharged and can only be moved with great care and effort. These patients

are referred to as the “hard-core” (or “hard-core” patients. They are chronically or acutely ill or injured and should, therefore, receive careful consideration. The “hard-core” patient may be nonambulant, i.e. cannot walk or move about unassisted, and therefore, may be unable to care for him or herself. Others may be incontinent, i.e. unable to control their bowels and bladders, making it undesirable to place them in a communal shelter. Hearing and visual impairments and lack of awareness of their surroundings will prevent patients with these health characteristics from being released unattended.

“Hard-core” patients include the aged suffering from chronic conditions including malignant neoplasms, diabetes, vascular lesions affecting the central nervous system and heart disease. Not all “hard-core” patients are aged. Others are persons on respirators and kidney dialysis; those requiring continuous oxygen therapy, stryker frames or traction; serious burn patients; infants with congenital anomalies and/or prematurity; and individuals requiring continuous cardiac monitoring.

2. Implications for Crisis Relocation Planners

For the evacuating jurisdiction, the “hard-core” institutionalized population presents a special problem. The decision to evacuate “hard-core” patients hinges on several factors: the condition of the particular patients; whether or not there is time to move them; the availability of properly-equipped transportation for safe movement; and the capability of the host area to provide the needed health care. Familiarity with the health characteristics and conditions of the hospitalized population, especially “hard-core” patients, will be important in deciding whether or not to relocate hospitalized persons. Should the decision be made to relocate

this population, it will be necessary to coordinate this activity with host area planners. If the h/m planner decides against evacuating “hard-core” patients, arrangements should be made to provide a skeleton staff to care for those patients and to provide increased fallout protection for both patients and staff. It may also be advantageous to consolidate “hard-core” patients into a few facilities in order to conserve health resources. This would permit the allocation of more health resources, e.g. manpower and supplies, to the host areas.

The host area planner should also plan to discharge hospital patients that have been admitted for elective medical or surgical procedures and treatment. With the additional number of people expected in the host communities, the existing hospital and other institutions’ beds are likely to be in great demand. If the plans are to evacuate the risk area “hard-core” patients, the host area planner is faced with additional planning responsibilities. The host area h/m planner should coordinate the transportation of patients from risk to host-area facilities with the risk-area planner. The expansion of existing hospitals may be necessary (Packaged Disaster hospitals used to augment fixed hospitals is one possibility), and it may also be necessary to improvise new h/m facilities (e.g., a hotel, motel, or lodge could serve as a makeshift health facility for less critical patients).

The host area h/m planner will be relieved of a considerable burden if risk-area plans do not include the evacuation of “hard-core” patients. Nevertheless, it may be wise to include in the host areas’ h/m annex, plans to expand existing health facilities and/or to improvise by converting non-health facilities to health facilities.

3. Health and Medical Problems Due to Relocation

The h/m planner should be aware of the types of problems that may be expected to result from crisis relocation. They are: 1) disruption of normal consumer-provider relationships in health services, 2) communicable disease outbreaks occurring among evacuees (and the host population) if crowded and/or insanitary conditions prevail, and 3) stress-related problems due to the fear and anxiety caused by crisis relocation.

E. Evaluation of Resources

In planning for the provision of h/m services during crisis relocation, it is essential to evaluate available h/m resources. Categories of health resources suggested for the planner's evaluation are manpower, supplies and equipment, facilities and community services, existing organizations, communications, and transportation.

1. Planning Data Sources

Before the planner can identify and evaluate the available resources, he needs to know where to obtain health data. This section identifies potential sources of health planning data.

Both state and local comprehensive health planning (CHP) agencies (usually located organizationally within health departments) compile data on health manpower, health facilities, health services, reportable diseases, and vital events. A listing of state comprehensive health planning agencies may be found in Appendix 2. It should be noted, however, that as a result of P.L. 93-641, the "National Health Planning and Resources Development Act", several existing health planning and resource development programs are being phased out and combined into a single administrative agency. Regional CHP agencies, regional medical programs, and Hill-Burton hospital construction programs will be replaced by health systems agencies (HSA's), and state CHP

agencies will be replaced by state health planning and development agencies (SHPDA's). These new agencies will become the sources for health planning data. H/M planners for crisis relocation should contact their state health departments for information about HSA's and SHPDA's. Also located in state health departments and in some local health departments, are health facilities' programs that compile data on hospitals, nursing homes, clinics, other health care facilities, laboratories and ambulance services.

Other sources of health manpower data are professional societies and associations, and licensure and registration agencies.

While the agencies and organizations mentioned above do not constitute a complete list, it is believed that they represent the more important sources of information on community h/m resources.

2. Health Manpower

The types and numbers of health manpower (e.g. physicians, sanitarians, emergency medical Technicians, etc.) in the community should be determined. A detailed list of health occupations which the planner may use to help identify health manpower is included as Appendix 3.

3. Supplies and Equipment

Supplies and equipment in the community necessary for the operation of health facilities and programs must be identified and located. In performing this evaluation, the planner should obtain the advice of clinical and public health specialists.

4. Facilities and Community Services

Community health facilities including general and specialty hospitals, nursing homes, other inpatient facilities (e.g. homes for the retarded), outpatient clinics, laboratories, blood banks, surgical supply houses, and pharmacies should be identified. In addition, non-health

facilities such as hotels, motels, and lodges containing beds which could be utilized as health facilities should be identified. Five beds (general and surgical hospital beds) per 1000 population is the national average; this ratio may be used to estimate needs.

5. Existing Organizations

Community organizations, especially those having emergency or disaster-oriented functions must be involved in the plan. Such organizations include the Red Cross, Emergency Medical Services (EMS), and the Salvation Army. Where well established, EMS and their respective EMS councils may be valuable resources in the planning and coordination activities of crisis relocation.

6. Communications

Alternate means of communications should be identified and evaluated. Obvious communications systems include normal landline communications (e.g., commercial telephone), and two-way radio (e.g., the emergency communications network of a comprehensive emergency medical service system). Radio and television may also be available to the h/m service for limited periods to transmit health advisories to the public.

7. Transportation

The transportation resources of the community that could be used for h/m purposes during crisis relocation must be identified. Requirements include transporting patients, health personnel, and supplies and equipment. Suitable transportation includes ambulances, specialty vehicles (e.g. mobile intensive care units), air ambulance services (helicopters and airplanes), rescue vehicles, mortuary vehicles, station wagons, vans, buses, refrigeration trucks and train cars, and other trucks and cars.

F. Determination of Needs

After examining the community's health status and available resources, the crisis relocation needs of the host and risk areas can be determined. Knowing how many people must be provided for during relocation, the h/m needs can be estimated. Relocation period needs can be estimated using desired ratios of resources to population and the total population to be served during the relocation period.

Thus, the product of the ratio (resources units/unit of population) times the Population to be served gives a needs estimate for that resource. Some suggested ratios are 1 physician, .57 dentists, 3.5 registered nurses, .63 pharmacists, and 1.8 practical nurses for 1000 population. The need for hospital beds can be estimated similarly. By comparing the h/m needs and the communities available resources, the planner can determine resources deficits. Supply and equipment needs will be more difficult to determine due to a shortage of data concerning location and amounts of supplies and items of equipment.

1. Host Area

Host areas will be receiving evacuees and will likely have greatly increased needs. A possible solution to the resource deficits would be to plan to provide allocations of resources from the evacuating jurisdiction(s). Additional resources from the state level and from areas with surplus of health resources may help host areas cope with deficits of health resources.

2. Evacuating (Risk) Area

With most of the risk area population evacuating, the medical, public health, and mortuary needs should be greatly reduced. However, the risk area planner should determine the needs for those remaining in the risk area ("hard-core" patients) and those commuting to and from the risk area

(critical workers), and plan to provide them with health services. Some of the “hard-core” patients will require more in the way of health care (e.g., more time from medical personnel and more in the way of special equipment) than any other patients. Risk area planners should not have difficulty in providing health care for critical workers and “hard-core” patients since they start with a resource surplus.

At this point in the preparation of the annex, planners may find it useful to re-examine their “situation” statement. In determining needs, peculiarities in their communities’ needs may have been identified which should be included in the “situation” statement. For example, part of a risk area’s situation may be the decision to consolidate the hospitals and other health care facilities. Or in the instance that a host area does not have a health department, the planner may wish to include in the situation statement words to that effect, recognizing that some consideration must be given to the provision of public health and sanitation services for the host area.

G. Functions

After determining h/m needs, the planner is ready to determine what actions or functions are necessary to meet those needs. A time-phased approach is suggested in developing a list of h/m functions. Three time phases can be identified: internal readiness, mobilization, and evacuation. The internal readiness phase involves all preparations for crisis relocation before the official order to relocate is received. Mobilization begins at this point and includes all actions designed to activate personnel and equipment prior to evacuation. Evacuation involves the movement of people, equipment, and supplies out of the risk area into the host area, the relocation period, and the movement back to the risk area after the threat of disaster has passed. It also involves the return of all h/m activities to normal readiness.

In general, the planner needs to consider how to provide primary and emergency medical care, environmental sanitation and communicable disease control, and interment of the dead during the crisis relocation period. The planner may wish to identify specific functions required at various stages of crisis relocation planning. A major function involves determining the existing h/m resources available in a particular area, including manpower, supplies, equipment, and facilities. Another function would be to establish liaison with various professional societies or associations, health planning organizations, disaster relief organizations, and other agencies which might be able to assist with CRP.

A detailed list of h/m functions is presented in Appendix 4 to assist the h/m planner. It is understood that this list may not meet all the individual needs in a specific h/m plan; it is intended as a planning aid rather than an exhaustive list of h/m functions.

H. Responsibilities

This section of the h/m annex is concerned with assigning various functions of tasks to participating organizations in order to meet the h/m needs of crisis relocation. The civil preparedness director will need to select a h/m coordinator and deputy coordinators to direct and coordinate the activities of the h/m service. These individuals should be willing and able to devote the time necessary for the planning and preparation of the h/m annex. This may be difficult for some professionals who already have many demands made on their time. For this reason, a professional employed by federal, state, or local government might be a good choice. However, an equally important criterion is that the individuals selected be respected by their peers.

The h/m coordinator should be a physician, respected by his or her colleagues and capable of obtaining their cooperation and participation. This individual could be the public health director, a hospital chief of staff, a trauma surgeon, an emergency room physician, the president of the local medical society, head of the local EMC council, or a physician in private practice. Three deputy h/m coordinators for medical care, public health, and mortuary services should be selected by the h/m coordinator in consultation with the civil preparedness director. The deputy coordinator for medical care could be a physician or a hospital administrator familiar with overall hospital operations, capable of enlisting interdepartmental cooperation, and qualified to provide leadership in a disaster situation. The deputy coordinator for public health should be a health administrator familiar with public health and environmental sanitation operations. The deputy coordinator for mortuary services might be the coroner or a local mortician.

These coordinators will need to work together to determine exactly what services are required by the host and risk-area populations during crisis relocation. Crisis relocation planning should be a joint effort involving host and risk-area planners and involving more than one crisis relocation emergency service. Figure 2 shows one possible h/m service organization; identifying some key areas of responsibility.

After identifying the responsibilities of the h/m service, the planner needs to prepare a complete list of participating organizations including hospitals, pharmacies, clinical laboratories, etc. Certain organizations such as professional organizations, the American Red Cross, and local military installations, etc., may be involved in a liaison capacity and should also be listed. It is then possible to assign responsibilities to

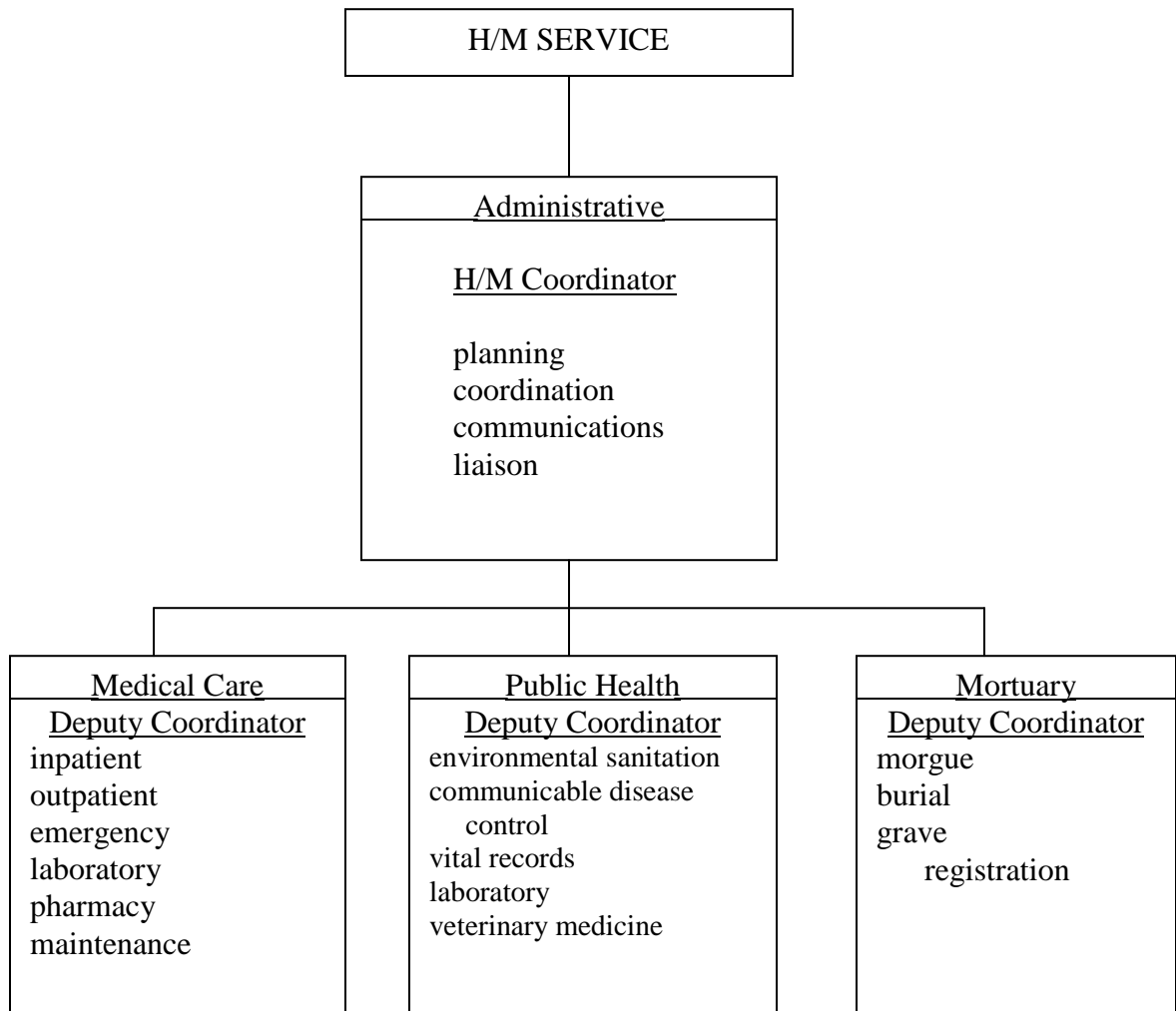


Figure 2. Responsibilities of H/M Service

the various organizations, enlisting their help in the crisis relocation effort. See part Three, Figure 2 for an example of a h/m service organization. An appendix should be prepared for each participating organization, detailing its organization and equipment, defining its responsibilities, assigning specific tasks and actions, and describing the deployment of each organization.

The responsibilities of the h/m service may differ according to the local situation. For instance, the emergency transportation of the patient to the hospital may be a function of the emergency department of the hospital, a private ambulance firm, the fire department, the police department or a community rescue squad. Depending on who provides this service locally, it may be the responsibility of the Health and Medical, the Law and Order, or the Fire and Rescue services during crisis relocation. The operation of health clinics during the relocation period may be the responsibility of the medical care section, the public health section or a liaison organization such as the American Red Cross. In some cases, this service may be provided through a cooperative effort of several agencies. Specialized institutions, such as schools for the blind or deaf, may fall under the responsibility of the Health and Medical service if these institutions are considered to be medical facilities. However, if they are considered to be educational facilities, they may be the responsibility of the Reception and Care service. Hence, it is important that such areas of uncertainty be identified and resolved prior to a crisis.

I. Coordination

Coordination provides a means of incorporating the planning efforts and services of various individuals and /or organizations into a h/m plan to be activated in the event of crisis relocation. This section offers suggestions on how the requisite coordination might be accomplished. The h/m service is continually interfaces with other crisis relocation emergency services. While some h/m needs may be confined to one jurisdiction, in most instances the needs will be present in both the risk and host areas, requiring a cooperative effort from h/m coordinators. This effort might best be made through a regional councils of governments and their respective comprehensive health planning (CHP) agencies. Regional CHP agencies normally have working relationships with health providers in the counties that make up their multi-county jurisdictions. In addition to serving as coordinating mechanisms among all the counties of a state, they may also be an effective mechanism for coordinating local and state h/m activities. Coordination, therefore, may involve not only the coordination within a particular h/m service, but may also involve the coordination with other crisis relocation emergency services and with those of other jurisdictions.

Examples of the “Coordination” section of the h/m annex is provided in Part Three of this volume. That coordination section lists the various coordinators of the h/m service along with their locations in an emergency. A listing of all participating organizations with their locations and telephone numbers follows. A description of available communications systems is also included. This identifies communication measures such as telephone, two-way radio, etc. which can be used during the relocation period. Any regional telecommunication capability which might be available may also be specified.

In addition to forms of communication, the planner needs to consider reporting procedures. This will allow the h/m coordinator to systematically check the status of the various participating organizations throughout the course of the mobilization and evacuation period. It would also provide a means for relaying information about problem situations which may develop. It offers a means for channeling information both within the h/m service and to other crisis relocation services, e.g., Law and Order, etc. The reporting procedure should specify an individual in each participating organization who will be contacted when crisis relocation is ordered. It should further specify how often each organization will be contacted and what type of information will be required. A status report might include information on the consolidation of expansion of risk/host-area hospitals; up-to-date reports on the establishment of temporary h/m facilities the final readiness of the resources and Supply service to move medical supplies; and the staffing of various h/m facilities, etc.

An action checklist provides the h/m coordinator with a means of checking the final readiness of the h/m service. This checklist might consist of a list of the most essential h/m preparations, questioning whether or not these functions have been accomplished. The number of items should be limited, allowing the h/m coordinator to quickly identify any areas which may require further preparation. Examples of such action checklists are found in Part Three of this volume.

Appendix 1
Health Characteristics Data

Appendix 1

Health Characteristics Data

This appendix provides quantitative information on the health characteristics of hospitalized and non-hospitalized U.S. populations and on the incidence and prevalence of certain acute and chronic conditions respectively, according to population size. Table I identifies the leading diagnostic conditions found in general hospitals with discharge rates and average length of stay.

Table II shows the rate of psychiatric admissions by region, while Table III indicates the percentage of these patients who may present special problems during crisis relocation with respect to their non-ambulatory, incontinent, mentally unaware, deaf and/or blind status.

The health characteristics of patients in chronic disease hospitals are shown in table IV.

Table V identifies the most common chronic conditions of nursing home residents, showing the percentage of patients with each condition. Table VI gives additional information concerning the health characteristics of nursing home residents.

Table VII and VIII estimate the number of case of certain acute and chronic conditions which might be expected during a two-week period by population size. The estimates given provide a 90 percent certainty, i.e., the estimated case loads will be correct 9 out of 10 times.

Table I. Leading diagnostic conditions in general hospitals by discharge rates* and average length of stay

Diagnostic Conditions	Discharge rate per 10,000 population	Average length of stay in days
All discharges**	1,437.1	8.5
=====		
Total, selected diagnostic conditions	701.5	8.1
=====		
Malignant neoplasms	53.5	15.3
Diabetes mellitus	19.5	12.2
Vascular lesions affecting central nervous system	25.8	16.6
Arteriosclerotic heart disease	54.3	14.5
Respiratory system diseases:		
Acute upper respiratory infections	19.8	5.2
Pneumonia, all forms	36.0	9.8
Hypertrophy of tonsils and adenoids	54.4	2.2
Digestive system diseases:		
Ulcer of stomach and duodenum	22.8	10.7
Appendicitis	17.1	6.8
Inguinal hernia	25.7	7.2
Gastroenteritis	26.1	5.2
Cholelithiasis and cholecystitis	24.7	11.0
Disorders of menstruation	20.3	4.5
Obstetrical conditions	214.1	4.1
Injuries:		
Fractures, all sites	52.9	13.6
Head injuries(excluding skull fracture)	16.5	6.1
Laceration and open wound	17.8	5.7

*The ratio of the number of hospital discharges (inpatients) to the number of persons in the civilian noninstitutional population.

** Excluding newborn infants

Table II
Hospitalization rate per 1,000 population for
psychiatric patients by region

Region			
Northeast	North Central	South	West
2.7	1.5	1.7	0.8

Table III
Percent of psychiatric hospital residents with
selected health characteristics
by geographic region*

Selected health characteristics	Geographic region			
	Northeast	North Central	South	West
Percent of residents				
Nonambulant	8	10	10	9
Not continent	13	13	12	10
Not mentally aware, part or most of the time	49	54	60	53
Hearing problem or deaf	5	5	6	6
Vision problem or blind	5	4	5	4

*Long-stay hospitals which served children only, children's wards, and maximum security wards were excluded from the survey.

Table IV

Percentage of patients of chronic disease hospitals
by selected health characteristics

Health characteristic	Percentage of residents
Nonambulant	48
Not continent	25
Not mentally aware of surroundings (part or most of the time)	41
Serious problem with vision or blind	15
Serious problem with hearing or deaf	13

Note: The percentages add to more than 100. This is due to the fact that many patients have more than one of the specified characteristics.

Table V

Percent of residents in nursing homes
with reported chronic conditions

Chronic condition	Percent*
Arteriosclerosis	57.5
Senility (including advanced)	56.4
Heart Trouble	36.3
Arthritis or rheumatism	33.2
Cerebrovascular disease (stroke effects)	25.1
Permanent stiffness or deformity (limbs or back)	23.8
Diabetes	11.9
Chronic trouble with back or spine	10.0
Paralysis of palsy not due to a stroke	9.8
Chronic conditions of digestive system	8.6

*Note that the percentages add to more than 100. This is due to the fact that many residents have more than one condition.

Table VI

The percentage and the number per 100,000 population
of nursing home residents with
the selected health characteristics

Health characteristics	Percent of residents	Number of residents Per 100,000 population
TOTAL RESIDENTS	100	280.7
Nonambulant	43	120.7
Not continent	27	75.8
Not mentally aware of surroundings, part or most of the time	50	140.3
Hearing problem, or deaf	16	44.9
Vision problem, or blind	19	53.3

*Assumed 180,000 for total population.

TABLE VII: NUMBER OF CASES (90 PERCENT CERTAINTY) BY ACUTE CONDITION AND POPULATION SIZE

DURING A TWO-WEEK PERIOD

Condition	Population Size									
	500	1,000	10,000	15,000	20,000	25,000	50,000	75,000	100,000	
All Acute Conditions	51	97	885	1316	1747	2177	4318	6454	8587	
Infective and Parasitic Diseases	7	13	102	150	197	244	476	706	935	
Common Childhood Diseases	2	3	18	25	32	39	74	108	142	
Virus, N.O.S.	3	6	43	62	80	99	190	281	370	
Other Infective and Parasitic Diseases	4	7	51	74	97	119	231	341	450	
Respiratory Conditions	30	56	492	731	968	1205	2383	3558	4730	
Upper Respiratory Conditions	18	33	282	418	552	686	1353	2016	2677	
Common Cold	14	25	211	311	411	510	1004	1494	1984	
Other Upper Respiratory Conditions	6	10	80	116	152	188	366	543	719	
Influenza	13	24	200	296	390	485	953	1418	1882	
Influenza with Digestive Manifestations	2	4	28	40	52	64	121	178	235	
Other Influenza	12	22	178	262	346	429	843	1254	1663	
Other Respiratory Conditions	2	4	27	38	49	61	115	169	223	
Pneumonia	1	1	5	7	9	11	21	30	38	
Bronchitis	1	2	14	20	26	32	60	87	113	
Other Respiratory Conditions	1	2	10	15	19	23	43	62	80	
Digestive System Conditions	4	7	53	77	101	125	241	356	470	
Dental Conditions	2	3	16	23	30	36	68	99	130	
Functional and Symptomatic Upper Gastrointestinal Disorders N.E.C.	2	3	23	32	42	51	97	142	186	
Other Digestive System Conditions	2	3	21	30	39	48	91	133	174	
Injuries	10	18	140	206	272	337	659	980	1300	
Fractures, Dislocations, Sprains and Strains	4	7	48	69	90	111	215	317	418	
Fractures and Dislocations	2	3	19	26	34	42	78	114	150	

(continued)

TABLE VII: NUMBER OF CASES (90 PERCENT CERTAINTY) BY ACUTE CONDITION AND POPULATION SIZE
DURING A TWO-WEEK PERIOD
(continued)

Condition	Population Size									
	500	1000	10,000	15,000	20,000	25,000	50,000	75,000	100,000	
Sprains and Strains	3	5	33	47	61	75	144	212	279	
Open Wounds and Lacerations	4	6	44	64	84	103	198	293	386	
Contusions and Superficial Injuries	3	4	31	45	58	71	136	199	263	
Other Current Injuries	3	5	33	48	62	76	146	215	283	
All Other Acute Conditions	9	17	138	203	268	332	650	965	1280	
Diseases of the Ear	3	5	31	45	59	72	138	203	267	
Headaches	1	2	11	16	21	25	47	68	89	
Genitourinary Disorders	3	5	31	45	59	72	138	203	267	
Deliveries and Disorders of Pregnancy and the Puerperium	1	2	14	20	25	31	57	83	109	
Diseases of the Skin	1	2	9	13	17	21	38	55	72	
Diseases of the Musculoskeletal System	2	3	17	24	31	38	72	105	138	
All Other Acute Conditions	4	6	47	69	89	110	213	314	414	

TABLE VIII: NUMBER OF CASES (90 PERCENT CERTAINTY) BY CHRONIC CONDITION AND POPULATION SIZE
DURING A TWO-WEEK PERIOD

Condition	Population Size									
	500	1000	10,000	15,000	20,000	25,000	50,000	75,000	100,000	
Chronic Sinusitis	61	116	1072	1596	2119	2640	5242	7838	10430	
Arthritis & Rheumatism	59	112	1031	1535	2037	2539	5041	7536	10028	
Asthma-Hay Fever	51	96	878	1306	1733	2159	4283	6402	8518	
Hearing Impairments	44	83	755	1123	1489	1855	3677	5495	7309	
Hypertensive Disease	38		632	939	1245	1550	3071	4586	6100	
Heart Conditions	32	60	529	786	1041	1296	2564	3829	5091	
Visual Impairments	30	56	498	739	980	1219	2413	3601	4788	
Chronic Bronchitis	22	41	354	524	693	862	1702	2539	3374	
Ulcer of Stomach & Duodenum	12	23	187	276	364	452	888	1321	1753	
Hernia of Abdominal Cavity	12	22	177	260	343	426	837	1245	1652	
Paralysis, complete or partial	6	10	81	119	156	192	374	555	734	
Emphysema	5	9	70	103	135	166	323	478	632	
Diabetes										

Appendix 2
State and Territorial Comprehensive
Health Planning Agencies

Appendix 2

State and Territorial Comprehensive Planning Agencies

ALABAMA	Comprehensive Health Planning Administration State Department of Public Health State Office Building Montgomery, Ala. 36104 Phone: (205) 269-6376
ALASKA	Office of Comprehensive Health Planning Department of Health and Social Services Pouch H - 01A Juneau, Alaska 99801 Phone : (907) 465-3050
AMERICAN SAMOA	Comprehensive Health Planning Government of American Samoa LBJ Tropical Medical Center Pago Pago, American Samoa 96920
ARIZONA	Division of Planning and Research Department of Health Services 1740 W. Adams Phoenix, Ariz. 85007 Phone: (602) 270-3431
ARKANSAS	Arkansas Comprehensive Health Planning Department of Planning 400 Train Station Square Victory at Markham Little Rock, Ark 72201 Phone: (501) 371-1641
CALIFORNIA	State Comprehensive Health Planning Program State Department of Public Health 576 Office Bldg. #6 744 "P" St. Sacramento, Calif. 95814 Phone: (916) 445-1945/449-2000

COLORADO	Division of Comprehensive Health Planning Colorado Department of Health 4210 East 11 th Avenue Denver, Colorado 80220 Phone: (303) 388-6111 ext. 356
CONNECTICUT	Health Planning Division Commission of Hospital & Health Care 340 Capitol Avenue Hartford, Conn. 06115 Phone: (203) 566-4517
DELAWARE	Bureau of Comprehensive Health Planning Department of Health and Social Services Jesse S. Cooper Memorial Building Dover, Del. 19901 Phone: (302) 678-4776
DISTRICT OF COLUMBIA	Division Of Comprehensive Health Planning Department of Human Resources 614 H Street, N.W. Room 707 Washington, D.C. 20001 Phone : (202) 737-7160
FLORIDA	Bureau of Comprehensive Health Planning Division of Planning and Evaluation Department of Health and Rehabilitative Services Bldg. # 2, Room 218 1323 Winewood Blvd. Tallahassee, Fla. 32301 Phone: (904) 488-8984
GEORGIA	Comprehensive Health Planning Unit State Department of Human Resources 16 Executive Park Dr., N. E. Atlanta, Georgia 30329 Phone: (404) 634-6342
GUAM	Department of Public Health and Social Services Government of Guam P.O. Box 2816 Agana, Guam 96910 Phone: 749-9901
HAWAII	Comprehensive Health Planning State Department of Health Kinau Hale, P.O. Box 3378 Honolulu, Hawaii 96801 Phone: (808) 548-4050, Ext. 565

IDAHO	Comprehensive Health Planning Agency Department of Health and Welfare Statehouse Boise, Idaho 83720 Phone: (208) 384-3269
ILLINOIS	Comprehensive State Health Planning Agency 525 W. Jefferson St., Suite 215 Springfield, Ill. 62706 Phone : (217) 782-3780
INDIANA	Comprehensive Health Planning State Board of Health 1330 W. Michigan St. Indianapolis, Ind. 46206 Phone: (317) 633-4943
IOWA	Office for Comprehensive Health Planning State Office of Planning and Programming 523 E. 12 th Street Des Moines, Iowa 50319 Phone: (515) 281-5888
KANSAS	Office of Comprehensive Health Planning Kansas Dept. of Health & Environment Forbes Air Force Base, Bldg. 730 Topeka, Kans. 66620 Phone: (913) 296-3747
KENTUCKY	Center for Comprehensive Health Systems Development Department for Human Resources 157 Health Services Building 275 E. Main Street Frankfort, Ky. 40601 Phone: (502) 564-4860
LOUISIANA	State Office of Comprehensive Health Planning 15 Riverside Mall, Suite 410 Baton Rouge, La. 70801 Phone: (504) 389-6201
MAINE	Comprehensive Health Planning Department of Health and Welfare 295 State Street Augusta, Maine 04330 Phone: (207) 289-2651

MARYLAND	Comprehensive Health Planning State Department of Health Suite 825, Medical Arts Building 101 W. Read Street Baltimore, Md. 21201 Phone: (301) 383-2430
MASSACHUSETTS	Comprehensive Health Planning Agency State Office Bldg. 100 Cambridge St. Boston, Mass. 02202 Phone: (617) 727-4164
MICHIGAN	Comprehensive State Health Planning Office Lewis Cass Bldg. Lansing, Mich. 48913 Phone: (517) 373-8155
MINNESOTA	Comprehensive Health Planning 101 Capital Square Bldg. 550 Cedar St. St. Paul, Minn. 55101 Phone: (612) 296-2407
MISSISSIPPI	Division of Comprehensive Health Planning 100 Watkins Bldg. 510 George St. Jackson, Miss. 39202 Phone: (601) 354-7621
MISSOURI	Office of Comprehensive Health Planning Department of Social Services Broadway State Office Bldg. Jefferson City, Mo. 65101 Phone: (314) 751-2055
MONTANA	Division of Comprehensive Health Planning State Department of Health and Environmental Science Cogswell Bldg. 510 Logan Avenue Helena, Mont. 59601 Phone: (406) 449-3121

NEBRASKA	Office of Comprehensive Health Planning Nebraska State Department of Health Lincoln Building 1003 "O" St. Lincoln, Nebr. 68508 Phone: (402) 471-2337
NEVADA	State Comprehensive Health Planning 1150 E. Williams 217 Capital Plaza Complex Carson City, Nevada 89701
NEW HAMPSHIRE	Office of Comprehensive Health Planning Department of Health and Welfare 2-1/2 N. Main St. Concord, N.H. 03301
NEW JERSEY	Comprehensive Health Planning Agency State Department of Health P.O. Box 1540 John Fitch Plaza Trenton, N.J. 08652 Phone: (609) 292-5960
NEW MEXICO	Comprehensive Health Planning Division State Health and Social Services Department P.O. Box 2348 307 State Securities Bldg. Santa Fe, N.M. 87501 Phone: (505) 827-2420
NEW YORK	State Health Planning Commission 84 Holland Ave. Albany, N.Y. 12208 Phone: (518) 474-2021
NORTH CAROLINA	Office of Comprehensive Health Planning 325 N. Salisbury St. Raleigh, N.C. 27611 Phone: (919) 829-4139
NORTH DAKOTA	Division of Health Planning State Department of Health Capitol Bismarck, N.D. 58501 Phone: (701)224-2894

OHIO	Office of Comprehensive Health Planning Ohio Department of Health 450 E. Town St., P.O. Box 118 Columbus, Ohio 43216 Phone: (614) 466-5364
OKLAHOMA	Oklahoma Health Planning Commission 20 Lincoln Plaza 4901 N. Lincoln Blvd. Oklahoma City, Okla. 73105 Phone: (405) 521-3821
OREGON	Office of Comprehensive Health Planning Oregon State Health Division 2111 front St., N.E., Suite 213 Salem, Oregon 97310 Phone: (503) 378-4878
PENNSYLVANIA	Division of Comprehensive Health Planning Pennsylvania Department of Health P.O. Box 90, 1030 Health and Welfare Bldg. Harrisburg, Pa. 17120 Phone: (717) 787-1761
PUERTO RICA	Comprehensive Health Planning Department of Health Ponce de Leon Avenue San Juan, P.R. 00908 Phone: (809) 722-2050, Ext. 398
RHODE ISLAND	Office of Comprehensive Health Planning State Department of Health 75 Davis Street Providence, R.I. 02908 Phone: (401) 277-2596
SOUTH CAROLINA	Office of Comprehensive Health Planning State Dept. of Health & Environmental Control 2600 Bull St. Columbia, S.C. 29201 Phone: (803) 758-5537
SOUTH DAKOTA	Division of Comprehensive Health Planning Department of Health East Office Building Pierre, S.D. 57501 Phone: (605) 224-3694

TENNESSEE	Office of Comprehensive Health Planning 360 Capitol Hill Bldg. 301 Seventh Ave., N. Nashville, Tenn. 37219 Phone: (615) 741-2978
TEXAS	Governor's Office of Comprehensive Health Planning One Highland Center 314 Highland Mall Blvd. Austin, Tex. 78752 Phone: (512) 475-4657
TRUST TERRITORY	Hqs. Dept. of Health Services Trust Territory of the Pacific Islands Saipan, Mariana Islands 96950
UTAH	Comprehensive Health Planning Department of Social Services 243 E. 4 th S. Salt Lake City, Utah 84111 Phone: (801) 328-5525
VERMONT	Comprehensive Health Planning State of Vermont 128 State St. Montpelier, Vt. 05602 Phone: (802) 828-3461
VIRGINIA	Office of the Comprehensive Health Planning State Department of Health 418 James Madison Bldg. Richmond, Va. 23219 Phone: (804) 770-4891
VIRGIN ISLANDS	Comprehensive Health Planning Agency Department of Health P. O. Box 1442, Charlotte Amalie St. Thomas, Virgin Islands 00801 Phone: (809) 774-5980
WASHINGTON	Office of Community Development Office of Comprehensive Health Planning 214A General Administration Building Olympia, Washington 98504 Phone: (206) 753-2246

WEST VIRGINIA	Office of Comprehensive Health Planning Governor's Office, State Capitol Charleston, W.Va. 25303 Phone: (304) 348-3765
WISCONSIN	Division of Health Policy and Planning 110 E. Main St., Room 813 Madison, Wisc. 53703 Phone: (608) 266-2020
WYOMING	Comprehensive Health Planning Division of Health and Medical Services Wyoming Department of Health and Social Services State Office Building West Cheyenne, Wyo. 82002 Phone: (307) 777-7750

Source: "Directory of State and Areawide Comprehensive Health Planning Agencies Supported Under Section 314 (a) and (b) of the Public Health Service Act and State Designated Planning Agencies Under Section 1122 of the Social Security Act. " Division of Comprehensive Health Planning, Public Health Service, Washington, D.C., March 1975.

Appendix 3

List of Health Occupations

Appendix 3

List of health Occupations

ADMININISTRATION OF HEALTH SERVICES

Assistant hospital administrator
Assistant nursing home administrator
Health administrator assistant
(Health agency) administrator
(Health agency) program representative
Health care facility surveyor
Health officer
Health planner
Health program analyst
Health program representative
Health systems analyst
Hospital administrator
Nursing home administrator

Hydrologist
Immunologist
Meteorologist
Microbiologist
Oceanographer
Pharmacologist
Physicist
Physiologist
Plant pathologist
Plant physiologist
Zoologist

ANTHROPOLOGY AND SOCIOLOGY

Anthropologist
Sociologist

BIOMEDICAL ENGINEERING

Biomedical engineer
Biomedical engineering aide
Biomedical equipment technician

AUTOMATIC DATA PROCESSING

Computer operator
Computer programmer
Systems analyst

CHIROPRACTIC AND NATUROPATHY

Chiropractor
Naturopath

BASIC SCIENCES IN THE HEALTH FIELD

Scientist
Anatomist
Biologist
Botanist
Chemist
Ecologist
Entomologist
Epidemiologist
Geneticist

CLINICAL LABRRATORY SERVICES

Clinical laboratory assistant
Clinical laboratory director
Clinical laboratory scientist
Clinical laboratory technician
Clinical laboratory technologist
Specialist in blood bank technology

DENTIST AND ALLIED SERVICES

Dental assistant
Dentist
Dental hygienist
Dental laboratory technician

LIST OF HEALTH OCCUPATIONS- Continued

DIETETIC AND NUTRITIONAL SERVICES

Dietetic assistant
(Dietetic) clerical worker
Dietetic technician
Dietitian
Food service worker
Nutritionist

ECONOMIC RESEARCH IN THE HEALTH FIELD

Health economist

ENVIRONMENTAL HEALTH

Environmental engineer
Environmental health aide
Environmental health technician
(Environmental) program specialist
Environmental scientist
Sanitarian

FOOD AND DRUG PROTECTIVE SERVICES

Food and drug analyst
Food and drug inspector
Food technician
Food technologist

HEALTH AND VITAL STATISTICS

Health demographer
Health statistician
Statistical assistant
Vital record registrar

HEALTH EDUCATION

Health education aide
Health educator

HEALTH INFORMATION AND COMMUNICATION

Biomedical photographer
Draftsman
Health information specialist
Illustrator
Medical illustrator
Poster and display artist
Science writer
Technical editor
Technical writer

LIBRARY SERVICES

Medical librarian
Medical library assistant
Patients' librarian

MEDICAL RECORDS

Medical record administrator
Medical record clerk
Medical records technician

MEDICINE AND OSTEOPATHY

Physician, all specialties

MIDWIFERY

Midwife

NURSING AND RELATED SERVICES

Attendant
Nursing aide
Orderly
Home health aide
Licensed practical nurse – L.P.N.
(Licensed) vocational nurse – L. V.
Registered nurse – R.N.

LIST OF HEALTH OCCUPATIONS- Continued

OCCUPATIONAL THERAPY

- Occupational therapist
- Occupational therapy aide
- Occupational therapy assistant

OPTOMETRY AND OPTICIANRY

- Dispensing optician
- Optical technician
- Optometric assistant
- Optometric technician
- Optometrist
- Vision care aide
- Vision care technologist

ORTHOTIC AND PROSTHETIC TECHNOLOGY

- Orthotic-prosthetic assistant
- Orthotic-prosthetic technician
- Orthotist
- Prosthetist

PHARMACY

- Pharmacist
- Pharmacy aide
- Pharmacy assistant

PHYSICAL THERAPY

- Physical therapist
- Physical therapist aide
- Physical therapist assistant

PODIATRY

- Podiatrist

PSYCHOLOGY

- Psychologist

RADIOLOGIC TECHNOLOGY

- Nuclear medicine technician
- Nuclear medicine technologist
- Radiation therapy technician
- Radiation therapy technologist
- Radiation technologist

SECRETARIAL AND OFFICE SERVICES

- Office aide
- Office assistant
- Receptionist
- Secretary

SOCIAL WORK

- Social work assistant
- Social work technician
- Social worker

SPECIALIZED REHABILITATION SERVICES

- Corrective therapist
- Corrective therapy aide
- Educational therapist
- Home economist in rehabilitation
- Manual arts therapist
- Music therapist
- Therapeutic recreation aide
- Therapeutic recreation(al) assistant
- Therapeutic recreation specialist

SPEECH PATHOLOGY AND AUDIOLOGY

- Audiologist
- Speech pathologist

VETERINARY MEDICINE

- Veterinarian

LIST OF HEALTH OCCUPATIONS- Continued

VOCATIONAL REHABILITATION COUNSELING

- Rehabilitation counselor aide
- Vocational rehabilitation counselor

MISCELLANEOUS HEALTH SERVICES

- Animal technician
- Cardiopulmonary technician
- Community health aide
- Electrocardiograph technician
- Electroencephalograph technician
- Emergency medical technician
- Extracorporeal circulation specialist
- Medical assistant
- Operating room technician
- Ophthalmic assistant
- Orthoptist
- Physician's aide
- Physician's assistant
- Respiratory therapist
- Respiratory therapy aide
- Respiratory therapy technician

Source: National center for Health Statistics: Health Manpower and Health Facilities, 1972-73, Health Resources Statistics, DHEW, Pub. No (HSM) 73-1509, PHS, Washington, D.C.: U.S. Government Printing Office, June 1973

Appendix 4

Functions of the Health and Medical Service

Appendix 4

Functions of the Health and Medical Service

The health/medical (h/m) needs of a population during relocation can be considered under the following jurisdictions: the evacuating; the host; and the state. Although some of the h/m needs are confined to one jurisdiction, the needs frequently overlap and require action on the part of all jurisdictions and interactions between them. However, since the scope and magnitude of h/m needs vary according to the particular jurisdiction, it is necessary to plan for the h/m needs within each individual jurisdiction.

In developing contingency plans to deal with the h/m needs of crisis relocation, a time-phased approach may be taken. This approach is utilized herein; three separate time phases are identified: internal readiness; mobilization; and evacuation. These phases have been defined [Ref. 29] as follows:

- Internal Readiness: “Actions taken from the planning period up to the receipt of advice to prepare to evacuate population centers. These include all internal readiness actions taken prior to the actual mobilization of staff and resources to effect an orderly evacuation from the cities to Host Jurisdiction.”
- Mobilization: “Actions required to activate the personnel and equipment necessary to effect an orderly evacuation of cities and to provide for continuation of operation of essential industry and government functions in the Evacuated Jurisdiction.”
- Evacuation: “Actions required to alert and evacuate population from cities and those required to lodge, maintain and care for evacuees in the Host Jurisdiction. Also included are those actions taken to permit the orderly return of evacuees to their home jurisdictions.”

The h/m service, responsible for the h/m phase of emergency preparedness, must consider each jurisdiction and all phases of emergency planning in order

to accomplish its mission:

“To provide medical care and treatment for the ill and injured and to minimize the incidence of disease during, or as a result of, an evacuation by providing emergency care to the hosted and host population, establishing medical care and treatment centers, monitoring treatment standards, establishing medical resupply requirements, instituting environmental sanitation measures, testing potable water supplies and supervising emergency interment of the dead.”[Ref. 30].

By anticipating the problems associated with natural disasters and population relocation, a variety of functions to be carried out by the evacuation host, and/or the state jurisdictions have been identified. Many of these functions were identified in the checklists developed by the Defense Civil Preparedness Agency and set forth in Operations for Population Relocation During Crisis Periods, Volumes II, III, and IV. Other functions were identified in Emergency Operations Plan, Comal County-New Braunfels, Annex E, and in Emergency Health and Medical Services prepared by Research Triangle Institute.

In listing h/m functions essential for crisis relocation, the following areas were considered: administrative, primary care, emergency care, public health and mortuary. The administrative area is considered with efforts in the development, revision and updating of plans and with the direction of resources to meet the h/m during crisis relocation. The primary care area is concerned with providing medical attention for the acute/chronic health needs of the people, while emergency care concentrates on immediate life-saving measures for the critically ill or injured, as well as medical attention for trauma and non-trauma related conditions.* Public health deals with matters relating to environmental health; communicable disease control and vital statistics, while mortuary oversees the handling and disposition of the dead.

*In some locations the Emergency Medical Service (EMS) is responsible for transporting the patient to the hospital and providing life-supportive treatment in transit. Elsewhere, this function is the responsibility of the Police Department, Fire Department, private ambulance firms, or others.

The following sections enumerate h/m functions for the evacuating, the host, and state jurisdictions during the internal readiness, mobilization and evacuation phases. The list is further subdivided into the administrative, primary care, emergency care, public health, and mortuary areas.

1. Evacuating Jurisdiction

a. Internal Readiness Phase

(1) Administrative

(a) List the names, addresses and telephone numbers of all active and retired medical and allied health personnel including nurses, physicians, dentists, veterinarians, students of the health professions, podiatrists, hospital administrators, pharmacists, sanitary engineers, etc., who might be utilized during crisis relocation, taking into account any special emergency assignments that would make them unavailable for the h/m service; e.g., with the national guard or military reserve units.

(b) List the names and addresses of all health care facilities in the evacuating areas establishing a primary and secondary contact with each, i.e., general hospitals, nursing care facilities, public health facilities, public and private health clinics, and specialized facilities such as mental health, tuberculosis and rehabilitation units.

(c) List the names and addresses of other institutions in the evacuating area with resident populations, e.g., jails, specialized schools, and orphanages.

(d) List the names and addresses of mortuaries in the evacuating jurisdiction.

(e) Identify means of communication including telephone, Emergency Broadcast System, emergency medical service communications such as 2-way radio and local ham radio operators.

(f) Identify a sender-receiver call system linking the units of the medical service and providing a communications network within each unit.

(g) Provide communication links with key individuals in services other than medical service, i.e., the Resource and Supply Service, the Welfare and Shelter Service, etc.

(h) Inventory all vehicles that might be used to transport patients, i.e., ambulances, mail trucks, etc., including their location and ownership. Determine the numbers and types that can be allocated to the host area.

(i) Inventory local medical resources including drugs, medical supplies, pesticides, etc. Include the location of each.

(j) List the names and addresses of blood collecting and banking facilities, working in cooperation with the Red Cross.

(k) In conjunction with the Red Cross, list names, addresses, and telephone numbers of all blood donors, particularly those with rare blood types.

(l) Determine the capability for providing emergency medical care for those in the evacuating area.

(m) Prepare basic health instructions (with medical guidance) regarding crisis relocation e.g., take a supply of medicines with you, wear medical identification bracelets indentifying problems such as diabetes, heart disease, etc.

(n) Institute programs to educate and train the public in first-aid and medical self-help.

(o) Conduct in-service education for h/m personnel on emergency preparedness.

(p) Provide identification cards for all h/m personnel assigned to the medical service.

(q) Update lists of personnel, facilities, and resources periodically.

(r) Maintain acceptable levels of preparedness by testing the emergency health plan and the proficiency of personnel.

(s) Coordinate the assignment of h/m personnel, and the use of medical facilities and supplies within the evacuating jurisdiction.

(t) Plan to allocate h/m personnel, supplies, and equipment to the host jurisdiction and to temporary h/m facilities for the evacuees in transit, as required.

(2) Primary Care

(a) Delineate the primary care requirements of crisis relocation.

(b) Create guidelines for classifying patients in terms of their ability to be evacuated.

(c) Develop plans to consolidate the staff and patients of medical facilities, as appropriate.

(d) Estimate the level of drugs required by primary care facilities in the evacuating jurisdiction during the evacuation period.

(e) Estimate the level of medical supplies (i.e., intravenous fluids, oxygen, sterile bandages, etc.) required by the primary care facilities in the evacuating jurisdiction during crisis relocation.

(f) Estimate the amount of whole blood required by primary and emergency facilities in the evacuating jurisdiction during crisis relocation.

(g) Determine the amount of medical supplies, drugs, and equipment to be allocated to the host jurisdiction, in cooperation with host area health/medical planners.

(h) Cooperate in the assignment of primary care personnel in the evacuating jurisdiction during crisis relocation and in allocating personnel to the host jurisdiction, if requested.

(i) Conduct training programs for personnel to improve their medical competency and efficiency.

(j) Maintain all equipment, e.g., respirators and monitoring systems, at the required levels of performance.

(3) Emergency Care

(a) Define the emergency care requirements of crisis relocation.

(b) Promote the development of emergency medical service (EMS) programs within the evacuating jurisdiction, and maintain high levels of proficiency for the emergency health personnel, e.g., physicians, nurses, technicians, and ambulance attendants.

(c) Conduct periodic simulated disaster exercises, utilizing the principles of triage.

(d) Estimate the required levels of equipment and medical supplies, e.g., suture materials, intravenous fluids, and sterile basins, for emergency care facilities during crisis relocation.

(e) estimate emergency care drug requirements of crisis relocation.

(f) Allocate a portion of medical supplies, equipment, and drugs to the host jurisdiction, if requested by host area planners.

(g) Cooperate in the assignment of emergency care personnel, considering the evacuation jurisdiction requirements and any host jurisdiction requests.

(h) Assist in training the general public in the principles of first-aid and medical self-help.

(i) Assist in planning for the consolidation of primary care facilities by providing for the transportation of patients.

(j) Maintain all emergency equipment at the required levels of performance.

(4) Public Health

(a) Determine the public health requirements of crisis relocation in the evacuating jurisdiction.

(b) Estimate the required levels of public health equipment, drugs, and medical supplies (e.g., vaccines, syringes and needles, water purification chemicals, pesticides, and spraying equipment) for use in the evacuation area during crisis relocation.

(c) Cooperate in the assignment of public health personnel in the evacuating area.

(d) Assist in the education of the public in matters of environmental health and communicable disease control and prepare public health guidelines for the general public to be disseminated during crisis relocation.

(e) Review the status of immunization programs and determine the requirements for this program in the evacuating area during crisis relocation.

- (f) Recruit and train public health aides for utilization during crisis relocation for basis public health programs, i.e., immunization, sanitation, etc.
- (g) Plan for the continuation of environmental sanitation services during relocation.
- (h) Assist, if requested, in the projection of public health needs within the host jurisdiction during population relocation.
- (i) In cooperation with host area public health agencies, provide for the allocation of supplies and equipment to the host area.
- (j) Plan for the continued inspection and analysis of water supplies, sewage disposal, solid waste disposal, and food supplies during crisis relocation.
- (k) Plan for the safeguarding and maintenance of vital records during crisis relocation.

(5) Mortuary

- (a) Continue internal readiness procedures for the disposition of the dead.
- (b) Provide for identification and graves registration. Arrange with the Red Cross for the notification of relatives during the evacuation phase.
- (c) Estimate mortuary supply needs for the crisis relocation period.
- (d) Cooperate in the assignment of mortuary personnel within the evacuating jurisdiction during relocation and provide for the allocation of personnel and supplies to the host jurisdiction.

b. Mobilization Phase

(1) Administrative

- (a) Notify key h/m personnel to prepare for evacuation.
- (b) Review and update all lists prepared during internal readiness phase, i.e., h/m personnel and facilities, blood donors, h/m vehicles, local resources.
- (c) Review contingency plans for emergency medical preparedness and update as necessary.
- (d) Review requirements for drugs, medical supplies, public health supplies, emergency vehicles, etc., and measures for resupply.
- (e) Review all emergency h/m assignments within the evacuating jurisdiction and assignments to host jurisdictions.
- (f) Prepare to move drugs, equipment, and supplies allocated to other areas and take appropriate security measures.
- (g) Review basic health instructions and medical guidance for the general public and prepare for distribution.

(2) Primary Care

- (a) Review plans for medical care during crisis relocation.
- (b) Identify the patients/residents who may be evacuated and prepare them for discharge.
- (c) Coordinate the consolidation of the remaining patient/resident population, as appropriate.
- (d) Review inventories of drugs, medical supplies, blood bank levels, etc., and alert Resource Service of additional needs.
- (e) Review assignments of h/m personnel and alter if indicated.

(f) Contact individuals and verify their assignments.

(3) Emergency Care

(a) Review plans for emergency medical services during crisis relocation.

(b) Review principles of triage with emergency care teams.

(c) Review inventories of drugs and medical supplies and notify Resource and Supply Service of any deficiencies.

(d) Review assignment of emergency care personnel to emergency care facilities in the evacuation area and at sites along evacuation routes.

(e) Contact the individuals and verify their assignments.

(4) Public Health

(a) Review public health responsibilities during crisis relocation with personnel.

(b) Review public health inventories giving special attention to immunization supplies, pesticides, water treatment chemicals, etc.

(c) Review assignments of personnel and supplies, and make final preparations for their movement.

(d) Contact the individuals and verify their assignments.

(e) Review the status of water supply, vector control, food hygiene, sewage disposal, etc.

(f) Maintain communicable disease surveillance in the evacuating jurisdiction and determine the communicable disease status before population relocation occurs. Notify host area public health agencies of any significant public health threat.

(g) Review plans to safeguard vital records and provide for the continuation of these records during crisis relocation.

(5) Mortuary

- (a) Review emergency plans for the handling and disposition of the dead.
- (b) Review assignments of personnel and verify these assignments with the individuals.
- (c) Review identification and grave registration readiness.

c. Evacuation Phase

(1) Administrative

- (a) Advise h/m service personnel when the order for population relocation is received.
- (b) Distribute health instructions and medical guidance material.
- (c) Maintain communications with h/m service units throughout crisis relocation.
- (d) Maintain records of the location and availability of all h/m personnel, supplies, and equipment and update this as changes occur during the evacuation phase.
- (e) Initiate changes in the above assignments to maximize the effectiveness of the emergency plan.
- (f) Coordinate h/m services within the evacuating jurisdiction during the evacuation phase.
- (g) Inform other services of h/m developments in order to facilitate the overall evacuation phase.
- (h) Assist, if requested, the host jurisdiction in meeting their h/m needs.
- (i) Direct that inspection of water and sewage systems be continued until normal operations are resumed.

- (j) Inventory all supplies, equipment, and drugs to determine current levels.
- (k) Request resupply of depleted levels of supplies and drugs.
- (l) Inform the h/m services to recall personnel and to return to normal operations when the decision to return to the evacuating jurisdiction is made.
- (m) Plan to increase readiness if health problems increase as evacuees return to their homes.

(2) Primary Care

- (a) When the order to relocate is received, discharge all able patients/residents in the care of families, friends, or other responsible parties for relocation to host jurisdiction.
- (b) Consolidate remaining patients/residents to maximize efficiency and effectiveness of medical care, as appropriate.
- (c) Provide medical care in evacuating jurisdiction by organizing h/m personnel into two teams to provide 24-hour coverage.
- (d) Inform administrative section of any revised assignments of h/m personnel.
- (e) Inform Resource and Supply Service of the levels of medical supplies and drugs.
- (f) Inform the administrative section of the status of patient census.
- (g) Assist the host jurisdiction, if requested, in meeting their h/m needs by allocating personnel, supplies, and equipment for use in the host area.
- (h) Return to normal operations after the evacuees return to their homes.

(i) Inventory all drugs, supplies, and equipment after crisis relocation has ended.

(3) Emergency Care

(a) Check final readiness of emergency care services.

(b) Maintain ambulance service throughout the evacuating jurisdiction to transport patients to hospitals.

(c) Continue to provide emergency medical services for those persons residing in or commuting to the evacuating area.

(d) Keep the administrative section informed of the assignments of h/m personnel/vehicles.

(e) Keep the resource and Supply Service informed of the levels of drugs and supplies.

(f) Alert the administrative section if h/m personnel, equipment, supplies must be augmented in order to provide for emergency medical services.

(g) Continue to provide emergency care as the evacuees return to their homes.

(h) Prepare to return to normal operations when informed that crisis relocation is over.

(i) Inventory all drugs, equipment, and medical supplies when the crisis has ended and plan for resupply as appropriate.

(4) Public Health

(a) Maintain acceptable standards for water supplies, sewage and solid waste disposal, food supplies, and insect and rodent control within the evacuating jurisdiction.

(b) Provide veterinary public health services to prevent the transmission of disease from animal to man, e.g., rabies.

(c) Direct environmental sanitation services in hospital and other medical care units or institutions.

(d) Assist in meeting the public health needs in the host jurisdiction, if requested.

(e) Inform the administrative section of public health activities, supplies, needs, and personnel assignments.

(f) Safeguard and maintain vital records during crisis relocation.

(g) Continue to provide public health services as evacuees return to their homes.

(h) Return operations to normal levels after the evacuation phase is completed.

(5) Mortuary

(a) Provide for the handling and disposition of the dead.

(b) Request that the Red Cross notify the relatives.

(c) Provide identification and graves registration.

(d) Inform the administrative section of personnel assignments, supply levels, or of any special need of the mortuary unit.

2. Host Jurisdiction

a. Internal Readiness Phase

(1) Administrative

(a) List names, addresses, and telephone numbers of the

active and retired medical and allied health personnel including nurses, physicians, dentists, veterinarians, sanitarians, paramedics, etc., who might be utilized if crisis relocation occurs.

(b) List all health care facilities, e.g., general and speciality hospitals; nursing homes; public health facilities; and public and private clinics, and determine the capability of each. Establish primary and secondary contacts in each facility.

(c) List the names and addresses of all other institutions in the host jurisdiction with health facilities, e. g., veterinary hospitals, jails, universities, public schools, orphanages, etc., which might be utilized during population relocation. Consider facilities that might be converted to temporary hospitals, e.g., hotels, university dormitories, etc.

(d) List names and addresses of mortuaries in the host area.

(e) Inventory local medical resources, including drugs, medical supplies, pesticides, medical vehicle, etc. Include the location of each.

(f) In conjunction with Red Cross, maintain an inventory of blood collecting and banking facilities. Include the names, addresses, and telephone numbers of each facility.

(g) Obtain a list of potential blood donors from the Red Cross or hospitals in the host jurisdiction, including names, blood types, addresses, and telephone numbers.

(h) Formulate a plan for providing medical care for the relocated population, emphasizing preventive medicine and public health and including primary and emergency medical care.

(i) Update lists of personnel, facilities, and resources periodically.

(j) Institute programs to educate the public in first-aid, medical self-help and public health. Prepare guidelines on personal health protection for distribution during crisis relocation.

(k) Maintain acceptable levels of preparedness by testing the emergency health plan and the proficiency of personnel, recognizing that population relocation will exert unusual demands on the health system.

(l) Conduct in-service education for health personnel on the principles of disaster medicine, preventive medicine, and environmental health.

(m) Provide identification cards for h/m personnel in the host jurisdiction.

(n) Coordinate the assignment of h/m personnel and the use of medical facilities, supplies, and equipment within the host jurisdiction.

(o) Direct planning for public health services such as sanitation, immunization, vector and rodent control, sewage inspection, water inspection, etc.

(p) Identify means of communication including telephone, Emergency Broadcast System, local ham radio operators, 2-way radio, and EMS communication systems.

(q) Identify a sender-receiver call system linking the various units of the host area medical service; provide communications within each unit.

(r) Provide communication links with key individuals in services other than the medical service, e.g., Police and Fire Protection.

(s) Determine how much state or evacuating jurisdiction support will be required to augment h/m preparedness; seek agreement to provide this assistance.

(2) Primary Care

(a) Determine the primary care requirements to be met during crisis location.

(b) Develop plans to reduce hospital populations by accelerating the discharge of patients/residents during crisis relocation. Establish a system to classify each patient/resident as to feasibility of discharge.

(c) Develop plans to provide additional medical support in the host jurisdiction so that the health needs of the relocated population are met. Consider the utilization of Packaged Disaster Hospitals (PDH) or the establishment of temporary health facilities by converting existing facilities (e.g., hotels or university dormitories) into hospitals.

(d) Estimate the level of drugs, medical supplies, and equipment required by primary care facilities during population relocation.

(e) Establish plans to provide for medical supplies; request allocations from state and evacuating areas for use during crisis relocation.

(f) Recruit blood donors to maintain acceptable levels in the blood banks.

(g) Assist in instructing the public in the principles of first-aid and medical self-help.

(h) Direct the assignments of primary care personnel, the use of medical facilities, and the distribution of supplies in the host area. Plan for the use of allocated personnel, medical supplies, and drugs.

(i) Construct training programs for personnel to improve their medical competency and efficiency.

(j) Recruit and train volunteers to assist in the delivery of medical care in the event of crisis relocation.

(k) Maintain all equipment at the required levels of performance.

(3) Emergency Care

(a) Define the emergency care requirements of crisis relocation, assuming the number of people seeking medical attention will be proportional to the increased population of the host jurisdiction.

(b) Promote the development of EMS programs within the host jurisdiction.

(c) Develop contingency plans for emergency care preparedness utilizing principles of triage.

(d) Conduct simulated disaster exercises in conjunction with primary care and public health.

(e) Maintain current inventories of drugs, emergency medical supplies, and equipment available in the host jurisdiction, e.g., cardiac arrest carts containing airways (adult, infant, and child), an arrest board, emergency drugs, a ventilation bag, etc.

(f) Estimate the increased inventory levels required by population relocation; develop plans to provide these levels.

(g) Cooperate in the assignment of emergency care personnel for the crisis relocation period in the host area. Plan for the use of allocated personnel, supplies, and equipment from the risk area.

(h) Recruit and train volunteers to assist in providing emergency care.

(i) Inform the administrative section of any deficiencies which will require augmentation, e.g., supplies, staff, etc.

(j) Maintain all equipment, e.g., respirators, cardiac monitors, EKG machines, etc. at the required levels of performance.

(k) Assist in training the public in first-aid and medical self-help.

(4) Public Health

(a) Define the public health needs of the host jurisdiction. Develop plans to meet these needs, e.g., immunization programs, water supply, rodent and vector control, food hygiene, waste and garbage disposal, etc.

(b) Maintain current inventories of public health resources available in the host jurisdiction, including drugs, sanitary chemicals, equipment, personnel, vehicles, etc.

(c) Estimate the public health requirements of the host jurisdiction for crisis relocation. Develop plans to provide these requirements by requesting assistance from the state and evacuating jurisdictions.

(d) Institute programs to educate the public in matters relating to environmental health and communicable disease control.

(e) Recruit and train public health aides for utilization during crisis relocation.

(f) Plan to assist the primary and emergency care sections in providing health care for the relocated population.

(g) Review the status of immunization programs in the host area. Plan to supplement these programs to deal with an increased population.

(h) Review the status of existing drinking water supplies, garbage and waste disposal facilities.

(i) Review plans for food inspection, immunization programs, housing inspection, and vector and rodent control, etc.

(5) Mortuary

(a) Identify the mortuary requirements of the host jurisdiction.

(b) Estimate mortuary supply needs for the host jurisdiction and determine if local resources can meet these needs. Request assistance from the evacuating and state jurisdiction, if necessary.

(c) Plan to coordinate local mortuaries in order to handle increased demands for service during the crisis period.

(d) Assign mortuary personnel in the host jurisdiction and plan for the utilization of allocated personnel.

(e) Recruit and train volunteers to assist the mortuary service in the event of population relocation.

b. Mobilization Phase

(1) Administrative

- (a) Notify key h/m personnel to prepare for the evacuation phase.
- (b) Review all lists prepared during internal readiness phase, i.e., h/m personnel, facilities, etc.
- (c) Review plans to provide h/m care for the relocated population; determine if plans are adequate.
- (d) Request assistance from state and evacuating jurisdictions, if necessary.
- (e) Review current inventories and requirements for drugs, medical supplies, public health supplies, emergency vehicles, etc., request assistance from state or evacuating jurisdictions, if required.
- (f) Arrange for the storage and handling of additional drugs, equipment, and h/m supplies.
- (g) Review all h/m assignments within the host jurisdiction and plans for augmentation and advise the State Jurisdiction of additional needs.
- (h) Prepare to send basic health instructions and guidelines to Resource and Supply Service for distribution at the population centers.
- (i) Continue to maintain communications with all sections of the h/m service and the other emergency services as required.

(2) Primary Care

- (a) Review plans for providing medical care for the host and hosted population.

(b) Identify patients who may be discharged in order to reduce the hospital census; prepare them for discharge.

(c) Review the status of medical supplies, drugs, blood bank levels, and alert Resource and Supply Service of additional needs.

(d) Review the assignments of h/m personnel and volunteers and determine adequacy of staffing.

(e) Contact individuals and verify their assignments.

(f) Assist in the final readiness of first-aid stations or clinics within population centers to provide on-site medical attention for evacuees.

(g) Inform the administrative section of medical care readiness, requesting assistance as needed.

(3) Emergency Care

(a) Review plans for providing emergency medical care for the host and hosted populations.

(b) Review status of medical supplies, drugs, and emergency equipment and determine if levels will be sufficient to provide for emergency rooms and mobile emergency units. Request augmentation, if needed.

(c) Review assignments of emergency care personnel and volunteers and determine if staffing will be adequate. Request augmentation, if indicated.

(d) Contact individuals and verify their assignments.

(e) Assist in preparing for first-aid stations or clinics in the population centers.

(f) Ready all mobile emergency units and review their assignments.

(g) Notify the administrative section of emergency care readiness.

(4) Public Health

(a) Review plans providing for increased public health needs during population relocation.

(b) Make ready inspection procedures for lodging, water and sewage systems, etc.

(c) Make final preparation for regular health and sanitation inspection during the relocation period.

(d) Review status of public health supplies, pesticides, immunizations, drugs, syringes and needles, etc. Request additional supplies, if needed.

(e) Review status of water supply and food supplies, and arrangements for storage.

(f) Review assignments of public health personnel and volunteers and determine if staffing will be adequate. Request augmentation, if indicated. Confirm the assignments with each individual.

(g) Assist in readying medical care facilities for the hosted population, e.g., immunization clinics and first-aid stations.

(h) Determine the status of communicable diseases in the host jurisdiction prior to evacuation and plan for continued surveillance during the evacuation phase.

(5) Mortuary

(a) Review plans for the disposition of the dead.

(b) Review the assignment of personnel and volunteers and verify these assignments with the individuals concerned.

(c) Review identification and grave registration readiness.

c. Evacuation Phase

(1) Administrative

(a) Notify all h/m sections that evacuation has begun.

(b) Send medical guidelines to population centers for distribution.

(c) Maintain records of the location and availability of all h/m personnel, supplies, and equipment and update as changes occur within the host jurisdiction.

(d) Coordinate h/m services in the host area during the evacuation phase; make changes necessary to maximize the effectiveness of h/m services.

(e) Inform other services of developments within the medical service to facilitate overall evacuation phase.

(f) Inform the state jurisdiction of any needs during the evacuation phase.

(g) Assist in the resolution of any health problems which may develop.

(h) Notify each section of the h/m service when the evacuation phase is to end.

(i) Inventory all drugs, medical supplies, and equipment and plans for their disposition if levels are excessive or for their resupply if depleted.

(j) Request that the public health section arrange for sanitary inspection of lodgings, sewage and garbage disposal, and water supplies when movement of evacuees is completed.

(k) Advise all medical services units to return to normal operations.

(2) Primary Care

(a) Reduce the hospital census by discharging all able patients in the care of families, friends, or other responsible parties.

(b) Notify all personnel to report to their stations at the appropriate times and periodically review their assignments.

(c) Determine if staffing is adequate and notify the administrative section if augmentation is required.

(d) Provide medical care for the host jurisdiction by operating primary care units or other health care facilities.

(e) Review the status of first-aid stations and other temporary health facilities and provide additional personnel to staff them, if indicated.

(f) Determine any special medical problems of evacuees as they arrive at population centers. Inform evacuees of the medical care facilities available.

(g) Maintain an inventory of medical supplies and drugs located at the various primary care facilities and notify the resource and Supply Service as needs are foreseen.

(h) Continue all operations during the evacuation phase until all evacuees have returned to their homes.

(i) Recall all personnel when advised to do so and prepare to return to normal operations.

(j) Inventory all supplies and drugs and notify the Resource and Supply Service of the need to return unused materials.

(k) Restock depleted medical supply and drug items

(3) Emergency Care

(a) Maintain 24-hour coverage of all emergency care facilities to provide emergency care for those residing in or relocated to host jurisdictions.

(b) Notify personnel to report to their stations and periodically review the assignments, requesting augmentation from the state or evacuating jurisdiction, if staffing becomes inadequate.

(c) Assist in delivering health care evacuees in population centers by providing personnel, supplies, and /or drugs when possible.

(d) Maintain an inventory of medical supplies and drugs and notify the Resource Supply Service as needs are foreseen.

(e) Continue all operations throughout the entire phase of evacuation, i.e., until the movement of the hosted population back to the evacuated area is complete.

(f) Recall personnel when the evacuation phase is complete and prepare to return to normal operations.

(g) Inventory all supplies and drugs and notify the Resource Supply service of the status of each.

(h) Return inventory levels to normal by reordering depleted supplies or notifying the Resource and Supply Service of excessive levels.

(4) Public Health

(a) Notify all public health personnel that the evacuation has begun and request that they report to their assigned station.

(b) Inspect lodging facilities, water supply, food supply, sewage systems, and garbage disposal system in host area.

(c) Continue to inspect water supplies, sewage and solid waste disposal, rodent and vector control, food supplies, and environmental sanitation services of hospitals, institutions, and other public facilities.

(d) Conduct immunization programs for host area population as appropriate.

(e) Provide veterinary public health services to prevent the transmission of disease from animal to man.

(f) Assist in providing medical care for the hosted population by assigning personnel to help staff health stations.

(g) Review the status of public health supplies and drugs and notify the Resource and Supply Service if more supplies are needed.

(h) Assist in determining any medical problems of evacuees as they arrive at the population centers.

(i) Provide surveillance of the hosted population to identify any outbreaks of communicable diseases during the evacuation period.

(j) Maintain all public health operations throughout the period of residency of the hosted population in the host jurisdiction.

(k) Direct sanitation teams to inspect the lodgings and the sewage and garbage disposal areas when population centers have been evacuated.

(l) Inspect sanitary landfills and waste disposal areas within the host jurisdiction. Advise the Resource and Supply Service on methods of handling solid waste.

(m) Inventory all drugs and supplies and notify the Resource and Supply Service of the status of each.

(n) Prepare to return unused supplies or to restock depleted supplies.

(o) Return to normal operations.

(5) Mortuary

(a) Inform all mortuary personnel that evacuation has begun and direct individuals to report to their assigned stations.

(b) Continue to provide for the handling and disposition of the dead, augmenting existing operations as needed.

(c) Utilize volunteers and allocated personnel to provide complete mortuary services.

(d) Coordinate all mortuary personnel within the host jurisdiction to provide for the increased demands.

(e) Maintain proper identification and grave registration.

(f) Return to normal operations when the evacuation phase is completed.

(g) Inventory the remaining supplies and equipment and plan to return to normal supply levels.

3. State Jurisdiction

a. Internal readiness Phase

(1) Administrative

(a) Conduct a strength analysis in the evacuating and in the host jurisdictions to identify the existing medical resources and to determine any deficiencies in the existing health systems.

(b) Review the status of hospital facilities in the evacuating and host areas to determine probable equipment, supply, and personnel shortages.

(c) Review area plans with a view to augmenting existing health facilities and organizing temporary health facilities during the evacuation phase.

(d) Review the h/m personnel available in the host area considering the proposed plans for augmentation.

(e) Review the h/m personnel available in the evacuating area, the projected needs and plans for allocation of h/m personnel jurisdiction.

(f) Identify h/m personnel available within the State who might be called on to assist the host area, e.g., retired physicians, veterinarians, dentists, nurses, sanitarians, morticians, etc.

(g) Plan for further augmentation of h/m personnel as indicated considering possible regional allocations to the host jurisdiction.

(h) Consider h/m manpower employed in fields other than health services, who might be available for utilization during the evacuation period.

(i) Review the status of medical, public health and mortuary supplies and equipment in the host and evacuating jurisdictions.

(j) Consider the projected supply requirements of the medical service and determine if the available supplies will adequately meet the needs of the evacuating and host jurisdictions.

(k) Review plans for the augmentation of supplies by the host jurisdiction. Review the allocation of supplies from the evacuating to host jurisdiction.

(l) Plan to provide for state allocations to host areas, if indicated

(m) Review the status of drug inventories in the host jurisdiction, and plans for the storage and control of these drugs in the host jurisdiction.

(n) Review the status of public health services available within the evacuating and host jurisdictions. If the host area does not have a public health agency, review host area plans and provide state assistance.

(o) Review plans to educate the public on matters of preventive medicine, first-aid and medical self-help. Provide planning assistance, if requested by either the evacuating or host jurisdiction.

(p) Review the plans of both jurisdictions to provide for mortuary services.

(q) Request that vital records continue to be maintained on births and deaths occurring during the evacuation period.

(r) Review plans for the movement of personnel and resources to the host area.

Make plans to assist if indicated.

(s) Remain available to assist the evacuating and host jurisdictions in the coordination of the h/m contingency plan.

(t) Review the communications system available in the evacuating and host jurisdictions.

(u) Plan for communications between the state, host, and evacuating jurisdictions.

(2) Primary Care

(a) Review plans to consolidate the staff, equipment, supplies, and patients in the evacuating jurisdiction hospitals.

(b) Evaluate the guidelines proposed by both the evacuating area and host area hospitals to reduce hospital censuses during the evacuation period.

(c) Review the proposal by the host jurisdiction to provide primary care for the relocated population. Provide advice, if indicated or requested.

(3) Emergency Care

(a) Review plans for the provision of emergency medical services in each area.

(b) Review the emergency medical service capabilities in both the evacuating and host area.

(c) Plan to augment existing emergency services during a crisis situation, as appropriate.

(4) Public Health

(a) Review the public health measures to be continued in the evacuation jurisdiction during the evacuation phase.

(b) Review plans to provide public health services (e.g., environmental and communicable disease control) in the host area during crisis relocation. Provide advice, if indicated.

(c) Review planned health activities for host area immediately following relocation period, i.e., inspection of housing, sewage, and garbage disposal, etc.

(5) Mortuary

Review the host and evacuating jurisdictions' plans for the provision of mortuary services.

b. Mobilization

(1) Administrative

(a) Request that all h/m personnel be notified that the evacuation phase is imminent so that they may prepare to report their assigned duty stations.

(b) Advise evacuating the host jurisdictions to prepare for the discharge of able patients and to make final preparation for the evacuation phase.

(c) Request the evacuating area to prepare for movement of all h/m personnel, supplies, drugs, and equipment to pre-assigned locations.

(d) Request a report from the host and evacuating jurisdictions on the status of communicable diseases prior to evacuation.

(e) Request that the public health agency in the evacuating jurisdiction continue normal functions but at reduced volume

for the population remaining there during the evacuation phase.

(f) Request that mortuary services continue to be provided in the evacuating area during the evacuation phase.

(g) Continue to remain communications with the host and evacuating jurisdictions on the status of crisis relocation.

(2) Primary Care

(a) Advise the host area to make final preparations for temporary medical facilities.

(b) Request a status report from the host and evacuating areas on the progress of their mobilization. Advise as necessary.

(3) Emergency Care

(a) Advise emergency medical services to prepare for the evacuation phase. Have both areas prepare for the movement of emergency mobile units to pre-assigned locations.

(b) Request status reports from host and evacuating areas on their readiness for population relocation; advise as necessary.

(4) Public Health

(a) Advise the public health section to prepare for the population relocation to the host area.

(b) Request a status report on public health readiness; advise if indicated.

(5) Mortuary

Review the state of readiness of evacuating and host jurisdictions with respect to mortuary services.

c. Evacuating Phase

(1) Administrative

(a) Advise both jurisdictions' medical services to begin evacuation phase. Have both areas move personnel and supplies to preassigned locations.

(b) Coordinate the action of all medical services to provide for the health of the host and evacuating jurisdiction populations.

(c) Maintain communications with both jurisdictions.

(d) Advise both jurisdictions when the decision to return the evacuees to their home is made.

(e) Advise both jurisdictions to return all medical services to normal operations.

(f) Request that the medical services of the host and evacuation jurisdictions compile a list of problems encountered during each phase of crisis relocation, in order that an evaluation of the h/m annex of the CRP can be made. Plan to utilize this information in plan revisions.

(2) Primary Care

(a) Assist, If requested, in the provision of primary care in the host and evacuating jurisdictions.

(b) Request continued high-level readiness by the primary care sections in both jurisdictions throughout the evacuation phase.

(c) Monitor the provision of primary care during the evacuation phase in an effort to learn of difficulties encountered in the provision of primary care. Request the host and evacuating

areas to make recommendations on planning revisions for primary care.

(3) Emergency Care

(a) Assist, if requested, in the provision of emergency medical care in the evacuating the host jurisdictions, Augment services, if needed.

(b) Request continued high-level readiness of emergency medical services, and augment, if necessary

(c) Monitor the provision of emergency care during the evacuation phase. Request information from the evacuating and host jurisdictions on how emergency care could be improved in future crisis relocations.

(4) Public Health

(a) Assist, if needed, in the provision of public health services in the evacuating jurisdiction as well as in the host jurisdiction.

(b) Request that continued readiness be maintained throughout the evacuation phase.

(c) Monitor public health services during the evacuation phase.

(d) Request recommendations for future planning revisions from the public health sections of both jurisdictions.

(e) Request status reports on the incidence of communicable diseases from the evacuating and the host areas. Compare these to status reports received prior to evacuation.

(5) Mortuary

(a) Assist, if requested, in the provision of mortuary services during the evacuation phase.

(b) Monitor the provision of mortuary services during the evacuation phase in an attempt to learn of difficulties encountered. Request recommendations on future plan revisions.

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PART THREE

PROTOTYPE PLANS

FOR

STATE OF COLORADO,

EL PASO COUNTY-COLORADO SPRINGS,

AND

FREMONT COUNTY

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PART THREE

PROTOTYPE PLANS

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COLORADO
CRISIS RELOCATION PLAN
(PROTOTYPE)

ANNEX D

HEALTH AND MEDICAL SERVICE

ANNEX D
Health and Medical Service

I. MISSION AND FUNCTIONS

The mission of the Colorado Health and Medical (H/M) Service is to coordinate and assist local areas (host and evacuating jurisdictions) in crisis relocation planning (CRP) and to support and coordinate activities among local areas in providing for the h/m needs of the people in the State during crisis relocation. State support will be either direct operational support, i.e., individuals may be assigned from a Colorado H/M Service to augment local h/m services along with available equipment and supplies; or, material support, i.e., the State will augment localities with equipment and supplies without State personnel for their operation and use.

In order to accomplish the mission, the following basic functions are required:

Preparatory Period

1. Identify and inventory existing State h/m resources, including material, facilities and personnel and plan for their use during the crisis relocation period.
2. Analyze the inventories of local h/m resources in host and evacuating jurisdictions to determine where deficits exist; coordinate plans to augment resources of evacuating and host jurisdictions.
3. Identify and inventory manufacturers, wholesalers, and retailers of h/m end items and plan for their transfer and distribution to host areas.

4. Assist the evacuating and host jurisdictions in the preparation of crisis relocation plans.
5. When the order to begin relocation is received, advise key personnel at State and local levels and deploy h/m resources as appropriate.

Relocation Period

1. Deploy State h/m personnel to relocation assignments along with available supplies and equipment when relocation begins.
2. Respond to requests for assistance during crisis relocation.
3. Assist in the transfer and distribution of h/m end items to host areas, as appropriate.
4. Use State-controlled health facilities located in host areas to expand bed capacity, etc., as appropriate.
5. Advise host and evacuating jurisdictions when the decision to return evacuees to their homes is made: return to normal readiness as situation allows.

II PARTICIPATION

The organizations participating in the Colorado H/M Service and an indication of their functional relationships are shown in Figure 1.

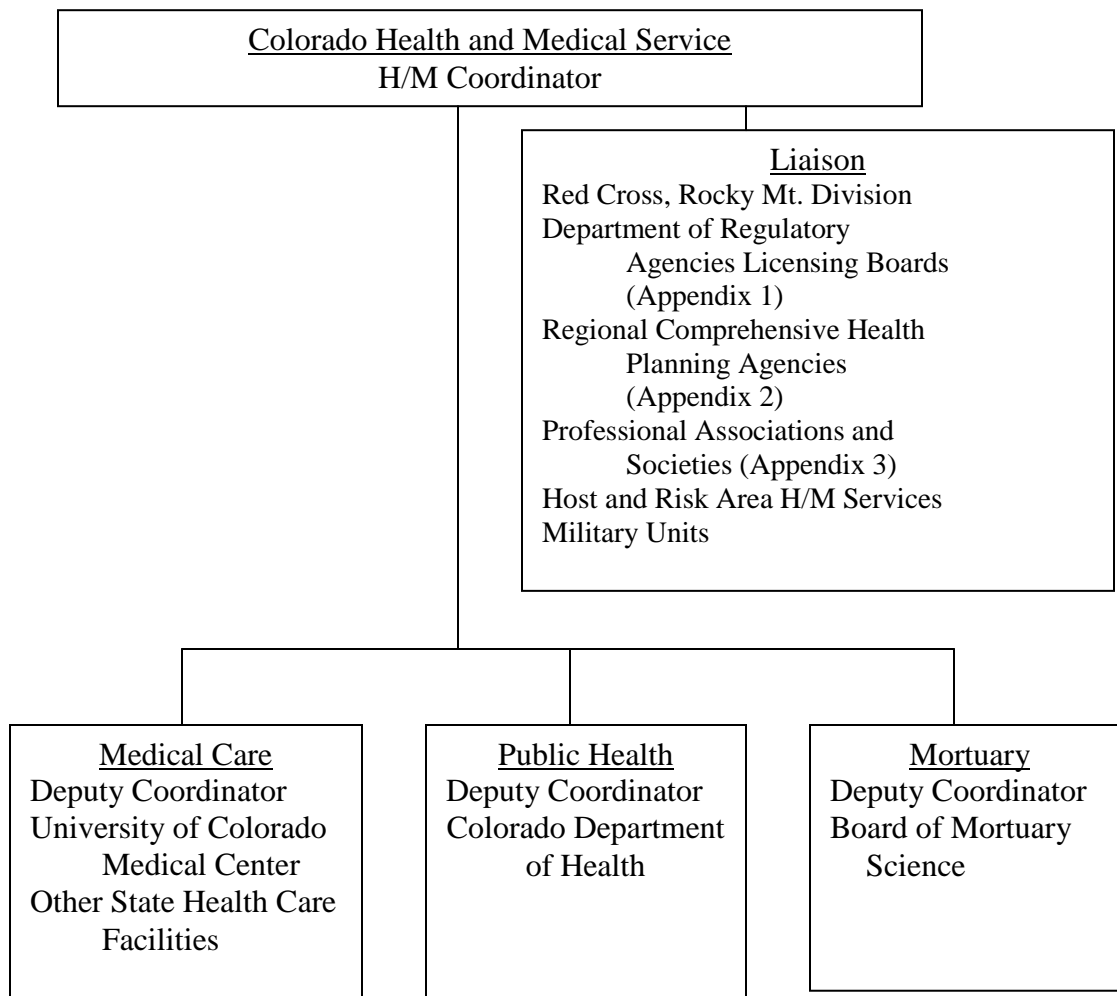


Figure 1. Colorado Health and Medical Service

III. SITUATION

The governor of Colorado has authority to direct the relocation of populations in the event of a threatened natural or man-made disaster. Relocation of risk areas, in this instance the Denver, Colorado Springs and Pueblo areas, will be mandatory and will be to selected host areas, i.e., counties outside of risk areas. For example, people from the Colorado Springs-El Paso County area will relocate to Fremont, Teller, La Plata, Saguache, Alamosa, Chafee, and Gunnison Counties and designated parts of El Paso County. The populations at risk will relocate over a three-day period. The relocated populations are expected to be away from risk areas and in the host areas for about two weeks.

The operations of the Colorado H/M Service will take place during both the preparatory and relocation time periods. The preparatory period includes both the internal readiness and mobilization phases. The relocation period begins with the order from the governor of Colorado to evacuate and includes the movement of people out of the risk area and into the host areas, the time spent in the host areas away from their normal places of residence, and the return of the population to the Denver, Colorado Springs, and Pueblo areas after the threat of disaster has passed. This movement of people will be accomplished primarily with private motor vehicles.

Colorado has a 1970 population of 2,207,259. About 1.5 million people are considered to be at risk and are to relocate. The numbers of people to be relocated from the three risk areas are as follows:

Denver-Boulder	1.2 million
Colorado Springs	0.2 million
Pueblo	0.1 million

Table 1 shows the relocation assignments for Colorado by County, including the resident population of each county, the relocates entering or evacuating the county indicated by a “plus” (+) or a “minus” (-) respectively, and the total population during the relocation period.

A portion of the evacuees will be relocating to host counties near the risk areas. Many of these people are critical workers or their dependents. Critical workers will commute back and forth in 12-hour shifts to the evacuated risk areas to operate certain essential facilities and activities in order to provide essential goods and services to maintain the security and integrity of the evacuated areas.

There are approximately 50,000 members of the Armed Forces located mainly in the risk areas. These people are not subject to civilian control and should not enter into any civilian planning efforts. Their dependents, however, are to be considered as part of the civilian population and should be included in any planning efforts.

All of the host counties will have greatly increased needs during relocation due to their increased populations. Based on the total number of people to be served, and using “desired” ratios of resource units to population, relocation needs were estimated. By comparing the estimated h/m needs with the counties’ available resources, resource deficits were determined. Table 2 gives estimates of the manpower and hospital bed needs and deficits for Colorado based on the anticipated relocation

TABLE 1. COLORADO RELOCATION ASSIGNMENTS BY COUNTY*

County	Resident Population	Relocatees Total	Population Total	County	Resident Population	Relocatees Total	Population Total
Adams	185,789	-177,974	7,815	Mesa	54,374	+135,935	190,309
Alamosa	11,422	+16,495	27,917	Mineral	786	-	786
Arapahoe	162,142	-155,853	6,289	Moffat	6,525	+16,312	22,837
Archuleta	2,733	-	2,733	Montezuma	12,952	-	12,952
Baca	5,674	+9,692	15,366	Montrose	18,366	+44,794	63,160
Bent	6,493	+14,851	21,344	Morgan	20,105	-	20,105
Boulder	131,889	-109,748	22,141	Otero	23,523	-	23,523
Chaffee	10,162	+22,115	32,277	Ouray	1,546	-	1,546
Cheyenne	2,396	+5,990	8,386	Park	2,185	+5,462	7,647
Clear Creek	4,819	+12,047	16,866	Phillips	4,131	-	4,131
Conejos	7,846	+10,430	18,276	Pitkin	6,185	-	6,185
Costilla	3,091	+7,727	10,818	Prowers	13,258	+33,144	46,402
Crowley	3,086	+5,803	8,889	Pueblo	118,238	-102,691	15,547
Custer	1,120	+2,800	3,920	Rio Blanco	4,842	+12,105	16,947
Delta	15,286	+38,215	53,501	Rio Grande	10,494	-	10,494
Denver	514,678	-514,678	-	Routt	6,592	+16,480	23,072
Dolores	1,641	-	1,641	Saguache	3,827	+5,890	9,717
Douglas	8,407	-	8,407	San Juan	831	+2,077	2,908
Eagle	7,498	+18,745	26,243	San Miguel	1,949	-	1,949
Elbert	3,903	+9,757	13,660	Sedgwick	3,405	-	3,405
El Paso	235,972	-231,522	4,450	Summit	2,665	+6,662	9,327
Fremont	21,942	+48,240	70,182	Teller	3,316	+7,900	11,216
Garfield	14,821	+37,052	51,873	Washington	5,550	-	5,550
Gilpin	1,272	-	1,272	Weld	89,297	-	89,297
Grand	4,107	+10,267	14,374	Yuma	8,544	-	8,544
Gunnison	7,578	+16,065	23,643	Kit Carson	7,530	-	7,530
Hinsdale	202	-	202	Lake	8,282	+20,705	28,987
Huerfano	6,590	+16,474	23,064	La Plata	19,199	+39,100	58,299
Jackson	1,811	+4,527	6,338	Larimer	89,900	+224,749	314,649
Jefferson	233,031	-155,359	77,672	Las Animas	15,744	+36,698	52,442
Kiowa	2,029	+5,072	7,101	Lincoln	4,836	+12,090	16,926
				Logan	18,852	-	18,852

*The above relocation assignments will be altered somewhat at a future time. However, they are sufficient for present planning.

TABLE 2. CRISIS RELOCATION NEEDS AND DEFICITS FOR COLORADO BY COUNTY

County	NEEDS ESTIMATE					EXISTING RESOURCES										DEFICITS				
	Physicians (1/1000)	RN's (3.5/1000)*	LPN's (1.8/1000)*	Dentists (.37/1000)*	Pharmacists (.63/1000)*	Hospital Beds (5/1000)*	Physicians	RN's	LPN's	Dentists	Pharmacists	Hospital Beds	Physicians	RN's	LPN's	Dentists	Pharmacists	Hospital Beds		
Adams	8	28	14	5	5	40	100	910	268	55	150	423	11	42	41	-	-	-		
Alamosa	28	98	50	16	18	140	17	56	212	99	107	70	-	-	-	-	-	70		
Alapahoe	6	21	11	3	4	30	245	1,202	212	-	4	592	1	10	19	2	-	15		
Archuleta	3	10	5	2	12	75	6	20	5	3	2	51	9	52	22	6	-	24		
Baca	15	52	27	12	13	105	7	22	19	1	1	16	14	52	19	11	-	90		
Bent	21	74	40	13	14	110	254	772	237	105	151	360	19	73	48	-	6	100		
Boulder	31	112	58	18	20	160	13	39	10	1	14	31	7	18	9	4	-	85		
Boulder	32	112	58	18	20	160	13	39	10	1	14	31	7	18	9	4	-	85		
Cherokee	8	28	14	5	5	40	1	22	1	1	1	31	16	38	30	9	7	58		
Clear Creek	17	60	31	10	11	95	4	9	11	1	4	32	14	34	19	5	5	55		
Conejos	18	63	32	10	17	55	2	6	1	3	-	-	9	30	8	2	3	45		
Cortez	11	38	19	6	6	45	2	2	8	-	1	-	1	11	6	16	20	20		
Crowley	4	14	7	2	3	20	3	3	1	7	544	28	43	157	61	24	16	242		
Custer	54	189	97	31	34	270	11	3,732	1,384	479	18	4,515	-	-	-	-	-	-		
Dallas	-	-	-	-	-	140	2,290	3,732	1,384	479	18	4,515	-	-	-	-	-	-		
Denver	-	-	-	-	-	140	2,290	3,732	1,384	479	18	4,515	-	-	-	-	-	-		
Dolores	2	7	4	1	1	10	6	31	7	6	9	-	2	6	7	1	1	10		
Douglas	8	28	14	5	5	40	1	22	1	1	1	-	2	74	42	8	8	130		
East	26	91	47	15	16	130	6	17	5	4	8	-	10	40	18	9	9	70		
Elbert	14	41	25	8	9	70	-	996	47	142	170	821	-	-	46	-	-	205		
El Paso	4	14	7	2	3	20	398	996	47	142	170	821	37	132	46	23	23	195		
Fremont	60	210	108	34	38	300	23	77	24	13	21	65	30	105	70	12	12	5		
Garfield	52	182	94	30	33	280	22	77	24	13	21	65	30	105	70	12	12	5		
Gilpin	1	4	2	1	1	5	7	3	4	-	1	20	-	32	20	6	11	96		
Grand	14	49	25	8	9	70	7	33	5	2	7	20	17	62	42	-	-	-		
Gunnison	14	49	25	8	9	70	7	33	5	2	7	20	17	62	42	-	-	-		
Hinsdale	23	80	41	13	14	115	5	15	15	-	3	38	18	62	26	11	11	30		
Huerfano	6	21	11	3	4	30	1	12	2	108	168	316	5	19	11	3	3	74		
Jackson	78	273	140	44	44	335	271	1,484	250	108	168	316	7	14	8	3	3	17		
Jefferson	7	24	13	5	5	40	-	26	11	2	6	18	28	14	3	-	-	-		
Kiowa	8	28	14	5	5	40	-	26	11	2	6	18	28	14	3	-	-	-		
Kit Carson	28	102	52	17	18	145	4	29	4	12	13	156	22	73	48	15	14	108		
Lafayette	58	203	104	33	37	290	36	111	28	42	96	271	45	92	18	20	24	134		
Larimer	315	1,102	567	180	198	1,575	134	442	81	5	8	96	181	660	318	118	102	1,185		
Las Animas	52	182	94	30	33	280	22	77	24	13	21	65	30	105	70	12	12	5		
Las Alamos	17	60	31	10	11	95	2	9	11	1	4	32	14	34	13	4	4	71		
Lincoln	19	66	34	11	12	95	24	89	62	8	17	98	15	49	25	3	-	-		
Logan	190	665	342	108	120	950	114	310	167	30	59	336	75	355	175	78	61	614		
Mesa	4	14	7	2	3	20	1	1	1	1	1	3	19	3	1	1	1	5		
Moffat	23	80	41	13	14	115	4	15	15	-	3	34	19	54	31	10	11	82		
Monte Vista	13	46	23	7	8	65	6	23	16	6	11	63	5	170	80	21	21	240		
Montezuma	63	220	113	36	40	300	28	50	33	7	19	75	39	14	4	6	4	31		
Montrose	20	70	36	11	12	100	11	56	41	7	10	69	9	14	-	-	-	-		
Morgan	24	84	43	14	15	120	22	85	66	8	20	127	2	4	4	4	4	10		
Otero	74	267	140	44	44	335	271	1,484	250	108	168	316	7	14	8	3	3	17		
Ouray	8	28	14	5	5	40	2	14	3	2	6	41	6	14	11	5	4	32		
Park	4	14	7	2	3	20	2	14	3	2	6	41	6	14	11	5	4	32		
Phillips	4	14	7	2	3	20	2	14	3	2	6	41	6	14	11	5	4	32		
Pitkin	6	21	11	3	4	30	2	12	2	8	14	30	-	-	63	16	17	177		
Prowers	46	161	83	26	29	230	167	611	398	54	93	934	14	34	19	5	7	37		
Pueblo	16	56	29	10	11	85	3	26	12	5	4	49	1	2	2	1	-	-		
Rio Blanco	17	58	30	10	11	85	3	26	12	5	4	49	1	2	2	1	-	-		
Rio Grande	29	95	48	16	17	110	9	34	16	4	14	20	16	46	33	9	1	50		
Rio Grande	29	95	48	16	17	110	9	34	16	4	14	20	16	46	33	9	1	50		
Routt	10	34	18	6	6	50	2	8	2	-	5	-	3	8	4	2	2	10		
Saguache	3	10	5	2	2	15	1	5	2	1	1	5	-	2	2	4	1	-		
San Juan	2	7	4	1	1	10	2	15	12	1	4	26	-	22	15	1	2	45		
San Miguel	3	10	5	2	2	15	4	10	1	1	4	4	10	6	11	2	3	5		
Sedgwick	3	10	5	2	2	15	4	10	1	1	4	4	10	6	11	2	3	5		
Summit	19	66	34	11	12	95	24	89	62	8	17	98	15	49	25	3	-	-		
Teller	14	49	25	8	9	70	7	33	5	2	7	20	17	62	42	-	-	-		
Teller	14	49	25	8	9	70	7	33	5	2	7	20	17	62	42	-	-	-		
Washington	89	312	160	51	56	445	114	432	100	35	68	384	5	10	54	13	13	61		
Washington	89	312	160	51	56	445	114	432	100	35	68	384	5	10	54	13	13	61		
Yuma	5	16	8	3	3	20	4	22	2	2	9	47	-	-	-	-	-	-		

* "Desired" or "national" ratios (Resource units to population).

period populations.

It is assumed that since the evacuated risk area will have greatly reduced h/m needs, appropriate amounts of resources from there will be allocated to the host areas and that the State will provide support in like manner.

IV. RESPONSIBILITIES

A. Office of the H/M Coordinator (Appendix 4)

Overall control of the h/m operations will be the responsibility of the H/M Coordinator. The H/M Coordinator will be assigned by deputy Coordinators for Medical Health and Mortuary Services. The responsibilities of the H/M Coordinator are:

1. To prepare and implement, in cooperation with the civil Preparedness Coordinator and participating organizations, a plan to support local (especially host area) h/m service organizations by supplying additional technical competence and materials, and to coordinate h/m activities between host and evacuating jurisdictions.
2. To establish liaison with local h/m service organizations through the 13 regional Comprehensive Health Planning (CHP) agencies in Colorado.
3. To establish liaison with other emergency services, i.e., Direction and Control, Law and Order, Fire and Rescue, Resource and Supply, and Reception and Care.
4. To identify existing h/m resources including personnel, facilities, and material in the host and risk jurisdictions and to determine deficiencies in the existing health system in the event of crisis relocation.
5. To prepare and maintain a roster of h/m personnel employed by the State.

6. To prepare and maintain a list of State h/m facilities including general hospitals, nursing care facilities, psychiatric hospitals, etc., and the patient capacity of each. For a list of State health care facilities, the h/m personnel at each, and the bed capacity of each, see Appendix 5.
7. To prepare and maintain a list of Health Department personnel (See Appendix 6).
8. To prepare and maintain a list of manufacturers, wholesalers, and retailers of drugs, medical supplies and equipment (See Appendix 7).
9. To coordinate plans to allocate resources from evacuating to host jurisdictions.
10. To plan for the support of host area h/m services through the use of State facilities and personnel.
11. To plan for the movement of h/m drugs, supplies and equipment to host and evacuating areas, as necessary.
12. To establish liaisons with medical service personnel of Armed Forces in the State.
13. To provide means of identification for Colorado h/m personnel.
14. To plan for and coordinate the relocation of essential State h/m personnel from risk areas to assigned locations in host areas.
15. To review the h/m plans of host and evacuating jurisdictions.
16. To direct h/m operations during the crisis relocation period.

B. Medical Care (Appendix 8)

A Deputy H/M Coordinator will be responsible for the planning and provision of medical care during crisis relocation. The Deputy Coordinator will be assisted by representatives of inpatient, outpatient, and emergency departments of State hospitals, nursing care facilities, and other health care facilities. Their responsibilities are:

1. To coordinate the plans of host and risk areas for providing medical care for the ill and injured, e.g., to coordinate plans to allocate h/m resources from the evacuating areas to the host areas.
2. To plan for and coordinate the augmenting of medical care in host areas by utilizing State personnel, equipment and supplies, and facilities as necessary.
3. To coordinate and assist in the relocation of health supply stocks to host areas.
4. To assist in the preparation of and review of host and evacuating jurisdictions' plans.

C. Public Health (Appendix 9)

A Deputy Coordinator for Public Health will head this section. The Deputy Coordinator will be assisted by public health nurses, sanitarians, and other public health specialists. Their responsibilities are:

1. To coordinate planning by host and risk areas to provide public health and environmental sanitation services in the event of crisis relocation.

2. To assist in the preparation of and /or review of host and risk areas' plans for the provision of public health services.
3. To plan for and coordinate the State Health Department's support of host and risk public health and sanitation services during relocation.

D. Mortuary Service

A Deputy Coordinator for Mortuary Services will head this section.

His responsibilities are:

1. To coordinate the plans of host and evacuating jurisdictions to provide mortuary services.
2. To plan to support mortuary activities, especially in the host areas, during relocation.

I. COORDINATION

A. Organization*

Dr. _____, President, Colorado Medical Society is the Health and Medical Service Coordinator. He has overall responsibility for h/m services in Colorado. He is located at the EOC at Camp George West, Golden.

Dr. _____, Director, Colorado Department of Health is the Deputy Coordinator for Public Health. He is located at 4201 E. 11th Avenue, Denver.

Dr. _____, Director, Emergency Section, University of Colorado Medical Center, is Deputy Coordinator for Medical Care. He is located at 4200 E. 9th Avenue, Denver.

Dr. _____, Director, Board of Mortuary Science, is Deputy Coordinator for Mortuary Services. He is located at the State Services Building., Denver.

* The person selected as H/M Coordinator should be a physician, respected by his or her colleagues, and capable of enlisting the cooperation and participation of medical and allied health professionals in the crisis relocation effort. This person could be the president of the State medical society or the director of the State Health Department.

The Deputy Coordinator for Public Health should be an individual familiar with public health and environmental sanitation activities. This person could be the health director, a health administrator, a sanitarian, or a public health nurse.

The Deputy Coordinator for Medical care could be either a physician or a hospital administrator familiar with overall hospital operations and capable of providing leadership in a disaster situation.

The Deputy Coordinator for Mortuary Services should be thoroughly familiar with mortuary operations, e.g., a partner or a corner of a practicing mortician.

B. Location and Phone Number

<u>Organization</u>	<u>Location</u>	<u>Phone Number</u>
State EOC (H/M Coordinator)	Camp George West, Golden	279-2511
Colorado Department of Health (Deputy-Coordinator-Public Health)	4201 E. 11 th Ave., Denver	388-6111
University of Colorado Medical Center (Deputy Coordinator-Medical Care) Colorado General Hospital, Psychiatric Hospital	4200 E. 9 th Ave. Denver	339-1211
University of Colorado Medical Center, Wardenburg Student Health Center	Boulder	443-2111
Board of Mortuary Science (Deputy Coordinator-Mortuary Service)	State Services Bldg., Denver	892-3304
Red Cross, Rocky Mt. Div.	170 Steele St., Denver	399-0550
Colorado Regional Comprehensive Health Planning Agencies (Appendix 2)		
Professional Associations and Societies (Appendix 3)		
Department of Regulatory Agencies, Licensing Boards (Appendix 1)	State Services Bldg., Denver	892-3304
State Home and Training School	10285 Ridge Rd., Wheat Ridge	424-7791
Trinidad State Nursing Home	409 Benedicta Ave., Trinidad	846-9291
State Home and Training School	1330 W. 17 th St., Pueblo	543-1185

<u>Organization</u>	<u>Location</u>	<u>Phone Number</u>
Colorado State Veterans Center	Homelake	852-3591
State Home and Training School	2812 “D “Road, Grand Junction	245-2100
Lookout Mountain School for Boys	Drawer 272, Golden	279-7681
Colorado Women’s Correctional Institute Medical Facility	East Grandview Ave., Canon City	275-3311 ext. 8-411
Colorado State Penitentiary Infirmary	West Main St., Canon City	275-3311
Fort Logan Mental Health Center	3520 West Oxford Ave., Denver	761-0220
Colorado State Hospital	1600 W. 24 th St., Pueblo	543-1170
Duane F. Hartshorn Student Health Center	Colorado State University, Fort Collins	491-6661

C. Communications

Participating organizations will communicate via commercial telephone and two-way radio as appropriate. Communications from the State EOC to the various h/m organizations will be by telephone.

D. Reporting Procedures

The H/M Coordinator will contact each of the participating organizations six hours after the governor has ordered relocation to begin to obtain status reports. Thereafter, participating organizations will be contacted every four hours until the end of the third day. Each organization will then be contacted at eight-hour intervals.

E. Action Checklist*

1. Preparatory Period

- a. Review and update roster of State h/m personnel.
- b. Review assignments of h/m personnel to the Colorado H/M Service.
- c. Contact State hospitals, nursing care facilities, public health facilities, etc., and review plans.
- d. Review and update inventories of drug and other health supply manufacturers and wholesalers.
- e. Review and update plans to provide h/m support to host and evacuating jurisdictions during relocation.
- f. Review and update plans to coordinate host and evacuating area h/m activities during relocation.
- g. Provide identification for h/m workers.
- h. Check communication links between the H/M Coordinator and the Deputy Coordinators for Medical Care, Public Health, and Mortuary Services; and between the Colorado H/M Service and the other emergency services and the local h/m services.
- i. Alert participating organizations when the order to begin crisis relocation is received.

2. Relocation Period

- a. Maintain records of h/m manpower, equipment and supplies in host areas and update as changes occur.

*It is understood that the H/M Coordinator is ultimately responsible for seeing that the listed actions are taken. However, the coordinator may be expected to delegate authority for certain of the actions to the Deputy Coordinators.

- b. Maintain communications with host and evacuating jurisdictions.
- c. Coordinate local h/m service activities during relocation.
- d. Provide support to local h/m services at the beginning of relocation and later as requests for additional assistance are received.
- e. Inform other emergency services of developments within the H/M service to facilitate overall relocation activities.
- f. Advise local jurisdiction when the order to end relocation is received and to step-down activities accordingly.
- g. Evaluate the effectiveness of the State and local h/m services during relocation. Revise the Colorado H/M Annex accordingly; coordinate and assist local h/m planners in revising their annexes.

Appendix 1

LICENSING BOARDS, DEPARTMENT OF REGULATORY AGENCIES

Colorado State Board of Chiropractic Examiners
State Services Building
Denver, Colorado
892-3304

Colorado State Board of Dental Examiners
1845 Sherman
Denver, Colorado
892-3037

Colorado State Board of Medical Examiners
Republic Building
Denver, Colorado
623-5329

Colorado Board of Mortuary Science
State Services Building
Denver, Colorado
892-3304

Colorado State Board of Nursing
State Services Building
Denver, Colorado
892-2058

Colorado State Board of Optometric Examiners
State Services Building
Denver, Colorado
892-3304

Colorado State Board of Pharmacy
State Services Building
Denver, Colorado
892-2526

Colorado State Board of Physical Therapy
State Services Building
Denver, Colorado
892-3304

Colorado State Board of Practical Nursing
State Services Building
Denver, Colorado
892-2191

Colorado State Board of Psychologist Examiners
State Services Building
Denver, Colorado
892-3304

Colorado State Board of Veterinary Medicine
State Services Building
Denver, Colorado
892-3304

Appendix 2
COLORADO REGIONAL COMPREHENSIVE HEALTH PLANNING AGENCIES

Denver Regional Council of Governments (COG)
1776 South Jackson Street
Denver, Colorado
758-5166

San Luis Valley COG
Box 123, Adams State College
Alamosa, Colorado
589-7925

Southwest Colorado CHP Council, Inc.
Post Office Box 618, 1901 Main Avenue #6
Durango, Colorado
259-1440

Region 6 CHP Association
Post Office Box 679
La Junta, Colorado
384-8136

San Isabel CHP Association
Post Office Box 510
Canon City, Colorado
275-8350

East Central Colorado CHP Council
Lincoln County Hospital
Hugo, Colorado
743-2421

Big Country CHP Council, Inc.
Post Office Box 1604
Montrose, Colorado
249-6132 extension 25

Northwest Colorado CHP Association, Inc.
Box 121
Kremmling, Colorado
724-3442

Pikes Peak COG
27 East Vermijo Avenue
Colorado Springs, Colorado
471-7080

West Central Colorado CHP Council, Inc.
Post Office Box 116
Rifle, Colorado
945-5840

Pueblo Area COG
1 City Hall Place
Pueblo, Colorado
545-7839

North Central CHP Association, Inc.
256 E. Mountain
Fort Collins, Colorado
493-1162

Northeast Colorado COG
Yuma County Courthouse
Wray, Colorado
332-4850

Appendix 3
PROFESSIONAL ASSOCIATION AND SOCIETIES

Colorado Dental Association
2045 Franklin
Denver, Colorado
861-8157

Colorado Health Care Association
1500 Grant
Denver, Colorado
861-8228

Colorado Hospital Association
2140 South Holly
Denver, Colorado
758-1630

Colorado Medical Society
1601 E. 9th Avenue
Denver, Colorado
534-8580

Colorado Nurses Association
5453 E. Evans Place
Denver, Colorado
757-7483

Colorado Pharmaceutical Association
5701 E. Evans Avenue
Denver, Colorado
759-0567

Colorado Veterinary Medical Association
2785 North Speer Boulevard
Denver, Colorado
458-0505

Appendix 4

OFFICE OF THE H/M COORDINATOR

ORGANIZATION:

H/M Coordinator:
Deputy Coordinator (Medical Care):
Deputy Coordinator (Public Health):
Deputy Coordinator (Mortuary Service):

REQUIREMENTS:

Communications systems (telephone primarily)
Reference Materials: State H/M Annex, host and risk area planning
Documents; resource lists (State and local); telephone directories

RESPONSIBILITIES:

Preparatory Period

1. Plan for two h/m administrative teams during crisis relocation to staff the EOC on a 12 hours-on and 12 hours-off basis.
2. Establish liaison with the participating h/m organizations, e.g., State health facilities, professional associations, CHP agencies, etc.; with the other State CRP emergency services, e.g., Resource and Supply, Law and Order, etc.; and with the local h/m coordinators.
3. Determine crisis relocation capabilities of State health care facilities.
4. Request that Colorado health organizations, e.g., the State Health Department, hospitals, etc., prepare lists of h/m personnel who might be utilized during crisis relocation.
5. Identify and maintain in cooperation with Resource and Supply Service a list of manufacturers and wholesalers of health supplies located in Colorado.
6. Conduct, in cooperation with the regional Comprehensive Health planning agencies in Colorado, a strength analysis of the host and evacuating jurisdictions to identify the existing h/m resources and

any deficiencies.

7. Plan to augment host area facilities State health facilities.
8. Request that the Resource and Supply Service conduct an inventory and inspection of State h/m resources in Colorado, including pharmaceuticals and medical supplies, water and sewage treatment supplies, Packaged Disaster Hospitals (PDH), etc.
9. Assign State h/m personnel to CRP duty stations in cooperation with the appropriate participating organizations with a view to augmenting h/m manpower in host areas.
10. Plan in cooperation with the Resource and Supply Service to assist in the movement or transfer of health supplies, drugs, and equipment, including PDH's to host are h/m centers.
11. Assist and coordinate local planning activities, e.g., advise the evacuating jurisdictions on plans to allocate h/m resources to the host areas, as appropriate.
12. Request that the State Health Department plan to provide support to counties with inadequate public health services in the event of crisis relocation.
13. Request that the Health Department and Red Cross plan to provide assistance to host or evacuating jurisdictions in planning to educate the public on matters of preventive medicine and first aid, if requested.
14. Update lists of State personnel, facilities and other resources periodically with the appropriate participating organizations.

15. Plan for the identification of Colorado H/M Service personnel.
16. Request that the Health Department continue to maintain vital records on births and deaths occurring during the relocation period.
17. Request that the Health Department in cooperation with the Fire and Rescue Service make preparations to support and coordinate local emergency medical services.
18. Direct and coordinate the development of plans prepared by the Medical Care, Public Health, and Mortuary Service sections to provide support and coordination to host and evacuating jurisdictions in Colorado.
19. Plan for communications with members of the Colorado H/M Service, with key individuals of the other emergency services, and with the local h/m services.
20. Plan for the movement of h/m personnel and resources into host areas as appropriate.

Relocation Period

1. When the relocation order is received, notify key h/m personnel of the Colorado H/M Service to begin crisis relocation operations and report to assigned duty stations.
2. Direct the movement of committed h/m resources to appropriate host areas.
3. As resources permit, respond to requests from host areas for additional State support during the relocation period.
4. Provide coordination of local h/m activities throughout the relocation period.

5. Maintain communications with host and evacuating jurisdictions.
6. Advise the local jurisdictions when the order to end crisis relocation is received and to return to normal readiness as the situation permits.
7. Evaluate the effectiveness of the Colorado H/M Service crisis relocation activities and determine problem areas; alter h/m plans accordingly.
8. Request reports from host and evacuating h/m services evaluating their activities.
Compile a list of problems experienced for incorporation into plan revisions.

DEPLOYMENT:

The H/M Coordinator and his alternate will be located in the EOC for a 12-hour shift each.

Appendix 5

STATE-CONTROLLED COLORADO HEALTH CARE FACILITIES BY COUNTY

County	Facility	Type	Beds	Physicians	Nurses	Dentists	Pharmacists
Denver	Avondale Heights Nursing Home	Facility for mentally retarded	113		1		
	Fort Logan Mental Health Facility	Psychiatric hospital & halfway house	259	18	85(RN)		2
	University of Colorado hospitals	General hospital Psychiatric hospital Student health center (Boulder)	386 67 22	202 45 14	322(RN) 29(RN) 15(RN)		12 3
Fremont	Colorado State Penitentiary Infirmary	Infirmary	58		4(RN)		
	Colorado Women's Correctional Institution Medical Facility	Infirmary	7	21/	1(RN)	11/	11/
Jefferson	Lookout Mountain School for boys	Infirmary	10		3(RN)		
	State Home and Training School	Facility for mentally retarded	685	3	30(RN) 1(LPN)	4	2
Larimer	Duane F. Hartshorn Student Health Center	Infirmary	32	9	20(RN) 2(LPN)		2
Las Animas	Trinidad State Nursing Home	Nursing care facility; Intermediate health care facility	235	5	24(LPN) 11(RN)	1	1
Mesa	State Home and Training School	Facility for mentally retarded and developmentally disabled	555	2	17(RN) 243(LPN)2/	1	1
Pueblo	Colorado State Hospital	Psychiatric hospital & general hospital	1113	17	146(RN)	2	3
	State Home and Training School	Facility for mentally Retarded	372	1	14(RN)		
Rio Grande	Colorado State Veterans Center	Immediate Health care facility	30		5(RN) 3(LPN)		1

1/ These individuals supply services to both the Colorado State Penitentiary Infirmary and the Colorado Women's Correctional Institution Medical Facility.

2/ These individuals are specially licensed as Mental Retardation Technicians.

Appendix 6

COLORADO DEPARTMENT OF HEALTH – H/M PERSONNEL

Physicians - 4

Nurses (RN) - 28

Dentists - 2

Public Health Educators - 8

Sanitarians - 75 (Includes sanitarians, engineers, & technicians)

Public health laboratory personnel - 75 (Denver laboratory)

2 (Alamosa branch laboratory)

2 (Glenwood Springs branch laboratory)

Appendix 7

MANUFACTURERS OF HEALTH/MEDICAL SUPPLIES

Biological Products

Biogen Inc.
12750 W. 42nd Avenue
Wheatridge, Colorado 80033
(Jefferson) 423-6391

Colorado Serum Co.
4950 York
Denver, Colorado 80216
(Denver) 623-5373

Control Products Inc.
9066 Logan
Thornton, Colorado 80229
(Adams) 451-8161

Meridan Bio-Medical Inc.
3278 S. Wadsworth Boulevard
Denver, Colorado 80227
(Jefferson) 986-5555

Smith, Paul A., Lab
12750 W. 42nd Ave.
Wheatridge, Colorado 80033
(Jefferson) 423-9504

Medicinals and Botanicals

Alpha Laboratories, Inc.
Corporation 1685 S. Fairfax
Denver, Colorado
(Denver) 756-1338

Pharmaceutical Preparations

Cooper USA Inc.
5030 York
Denver, Colorado 80216
(Denver) 222-1797

Demco Inc.
1632 E. 47th
Denver, Colorado 80216
(Denver) 255-5218

Hausman Drug Company, Inc.
122 West First St.
Trinidad, Colorado 81082
(Las Animas) 846-3211

Hemoline Inc.
5225 E. 38th Ave.
Denver, Colorado 80207
(Denver) 388-0993

Seney and Co., Inc.
10555 E. 51st Ave.
Denver, Colorado 80239
(Denver) 371-1830

Western Research Laboratories, Inc.
301 S. Cherokee
Denver, Colorado 80223
(Denver) 733-7207

Whittney and Co.
4655 Colorado Boulevard
Denver, Colorado 80216
(Denver) 755-2247

Surgical and Medical Instruments

Advanced Diagnostic Research
Post Office Box 248
Franktown, Colorado 80116
(Douglas) 688-3483

Bio-Feldback Systems, Inc.
2736 47th St.
Boulder, Colorado 80301
(Boulder) 444-1411

Decker Laboratories, Inc.
208 S. 22nd
Colorado Springs, Colorado 80904
(El Paso) 632-2977

Edge Manufacturing, Inc.
3060 South Vallejo
Englewood, Colorado 80110
(Arapahoe) 789-2097

Electro-Medical Systems, Inc.
Denver Tech. Circle Building 29
Englewood, Colorado 80110
(Arapahoe) 771-1117

Fogg System Company Inc.
2101 S. Leyden Street
Denver, Colorado 80222
(Denver) 758-2979

Franklin Laboratories, Inc.
4238 York Street
Denver, Colorado 80216
(Denver) 222-5715

Hauser Laboratories
5680 Central Avenue
Boulder, Colorado 80301
(Boulder) 443-4662

Honeywell Inc., Test Instruments Div.
Inc.
4800 E. Dry Creek Road
Denver, Colorado 80217
(Arapahoe) 771-4700

Kamar Inc.
West of City
Steamboat Springs, Colorado 80477
(Routt) 879-1041

Metrix, Inc.
876 Ventura
Aurora, Colorado 80011
(Arapahoe) 343-8330

Monaghan Plastics
6336 E. 39th
Denver, Colorado 80207
(Denver) 399-6752

MX International Inc.
794 Ventura
Denver, Colorado 80010
(Denver) 343-8330

Neomed, Inc.
5595 Arapahoe Avenue
Boulder, Colorado 80303
(Boulder) 449-2126

Terrasyn Inc.
804 S. Lincoln
Longmont, Colorado 80501
(Boulder) 772-4444

Trueline Instruments, Inc.
4002 S. Clay
Englewood, Colorado 80110
(Arapahoe) 781-6621

Unirad Corporation
4665 Joliet
Denver, Colorado 80239
(Denver) 371-7400

Valleylab Inc.
5441 Western Ave.
Boulder, Colorado 80301
(Boulder) 449-2340

Vicon Instrument Co.
828 Wooten Road
Colorado Springs, Colorado 80915
(El Paso) 596-5960

Wagner, Carl, Manufacturing Co.,
1243 W. Alameda
Denver, Colorado 80223
(Denver) 733-8224

Western Instrument Co.
4950 York
Denver, Colorado 80216
(Denver) 623-5373

3842 Surgical Appliances and Supplies

Adcomold Inc.
1558 California Street
Denver, Colorado 80202
(Denver) 266-9631

Chandler Orthopedic
1525 W. Eisenhower
Loveland, Colorado 80537
(Larimer) 667-2891

Cobe Laboratories, Inc.
1201 Oak Street
Lakewood, Colorado 80215
(Jefferson) 232-6800

Denecor, Inc.
5975 N. Broadway
Denver, Colorado 80216
(Adams) 892-0987

Denver Biomaterial Inc.
Highway 73 at N. Turkey Creek
Evergreen, Colorado 80439
(Jefferson) 674-5294

Edge Manufacturing Inc.
3060 South Vallejo
Englewood, Colorado 80110
(Arapahoe) 789-2097

Falcon Research and Development Co.
Wonder Inc.
1225 S. Huron
Denver, Colorado 80223
(Denver) 744-1473

Frost Engineering Development Corp.
3900 S. Kalamath
Englewood, Colorado 80110
(Arapahoe) 761-1010

Gaines Brace and Limb Co.
1420 E. 18th Avenue
Denver, Colorado 80218
(Denver) 825-2345

Hemoline, Inc
5225 E. 38th Avenue
Denver, Colorado 80207
(Denver) 388-0993

International Medical Products, Inc.
2125 S. Jasmine
Denver, Colorado 80222
(Denver) 759-4283

Long's Limb Shop, Inc.
1478 Birch
Denver, Colorado 80220
(Denver) 322-0780

Mace Manufacturing Inc.
4755 Beach Court
Denver, Colorado 80211
(Denver) 433-8844

Mesa Orthopedic Appliance Co.
2307 N. 7th Street
Grand Junction, Colorado 81501
(Mesa) 242-3210

Micro Machining Service
6070 W. 55th place
Arvada, Colorado 80002
(Jefferson) 423-3413

Micro Medic
1800 E. Lincoln
Fort Collins, Colorado 80521
(Larimer) 484-8480

Monaghan Co. Div. of Sandoz-

4100 E. Dry Creek Road
Littleton, Colorado 80122
(Arapahoe) 770-2700

Monaghan Plastics
6336 E 39th
Denver, Colorado 80207
(Denver) 399-6752

Mross Co.
Start Route Box 42
Elizabeth, Colorado 80107
(Elbert) 646-4096

Osteolite Products Co. Inc
842 E 18th Avenue
Denver, Colorado 80218
(Denver) 266-9063

Polycadence Inc.
6080 W. 55th place
Arvada, Colorado 80002
(Jefferson) 423-3412

Precision Plastics Corp.
5570 Harlan
Arvada, Colorado 80002
(Jefferson) 421-3130

Safety Service & Supply Corp
6561 W 56th Avenue
Arvada, Colorado 80002
(Jefferson) 423-1267

Scott-Thornton Orthopedics, Inc.
724 E 17th Avenue
Denver, Colorado 80203
(Denver) 266-3386

Teledyne Aqua Tec
East of Ft Collins
Fort Collins, Colorado 80521
(Larimer) 484-1352

Thompson Respiration Products Inc.
1925 55th Street
Boulder, Colorado 80301
(Boulder) 443-3350

Thornton Orthopedic of Pueblo
410 W. 1st Street
Pueblo, Colorado 81002
(Pueblo) 542-8522

Vicon Instrument Co.
International, Inc.
828 Wooten Road
Colorado Springs, Colorado 80915
(EL Paso) 596-5960

Western Orthopedic Appliances Inc
1309 W Alameda Avenue
Denver, Colorado 80223
(Denver) 733-8983

Dental Equipment And Supplies

Alamosa Dental Lab
315 Edison Avenue
Alamosa, Colorado 81101
(Alamosa) 589-2622

Copeland, A M, Dental Prosthetics
214 E Monument
Colorado Springs, Colorado 80902
(El Paso) 635-4781

Crawford Dental Laboratory
Division
232 E Cache La Poudre
Colorado Springs, Colorado 80902
(El Paso) 635-4781

De Lee Dental Lab
Missouri B
Montrose, Colorado 81401
(Montrose) 249-4312

Densco
3840 Forest
Denver, Colorado 80207
(Denver) 399-0240

Dentists Laboratory
600 Center Avenue
Grand Junction. Colorado 81502
(Mesa) 242-9101

Marquis Dental Manufacturing Co.
2005 E 17th Avenue
Denver, Colorado 80206
(Denver) 355-5033

Riedel Dental Manufacturing Co.
1050 S. Quitman
Denver, Colorado 80219
(Denver) 936-7489

Rocky Mountain Associates

700 W. Colfax Avenue
Denver, Colorado 80204
(Denver) 292-3570

Yarter-Tek Corporation
4134 Garfield
Denver, Colorado 80216
(Denver) 399-6700

Ophthalmic Goods

Acon Laboratories Co.
214 Empire Bldg
Denver, Colorado 80202
(Denver) 222-8966

American Optical Company
116 Pueblo Avenue
Colorado Springs, Colorado 80903
(El Paso) 633-2617

American Optical Corp/Contact Lens

1060 Bannock No. 317
Denver, Colorado 80203
(Denver) 255-1411

Antonelli Industries Inc.
515 W 2nd Street
Rifle, Colorado 81650
(Garfield) 625-1402

Automated Optics Inc.
2795 S Raritan
Englewood, Colorado 80110
(Arapahoe) 789-0900

Benson Optical Company
1133 Bannock
Denver, Colorado 80204
(Denver) 222-4881

Colorado Optical Corporation
5401 Western Avenue
Boulder, Colorado 80302
(Boulder) 447-2700

Columbian Biofocal Company
1700 15th Street
Denver, Colorado 80206
(Denver) 292-0240

Computa Contact Lens Company
180 Cook
Denver, Colorado 80206
(Denver) 321-7377

Contact Lens Company of America
430 16th Street
Denver, Colorado 80202
(Denver) 222-5302

Darnell Optical Company
618 Main Street
Grand Junction, Colorado 81501
(Mesa) 242-9154

Denver Optic Company
330 University Bldg
Denver, Colorado 80202
(Denver) 825-0229

Idol Optical Company
1010 Acoma
Denver, Colorado 80204
(Denver) 292-0010

Mastercraft Eyewear Inc
5601 N. Broadway
Boulder, Colorado 80302
(Boulder) 449-2535
Rock Mountain Optical
611 N. Grand Avenue
Pueblo, Colorado 81003
(Pueblo) 545-1872

Super Seer Corporation
Evergreen, Colorado 80439
(Jefferson) 674-6663

Appendix 8

MEDICAL CARE

ORGANIZATION:

Deputy Coordinator:
Director of Inpatient Services:
Director of Outpatient Services:
Director of Emergency Department Services:

REQUIREMENTS:

Communications systems (telephone, two-way radio)
Reference materials: State H/M Annex; resources lists, rosters
of medical personnel, inventories; telephone directories

RESPONSIBILITIES:

Preparatory Period

1. Establish contact with host and evacuating jurisdictions and review existing plans to provide medical care during relocation, provide advice, as appropriate.
2. Coordinate host area plans to provide medical care to an increased population with evacuating jurisdiction plans to allocate h/m resources; provide advice as appropriate.
3. Prepare and maintain lists of all State health facilities and personnel.
4. Prepare a list of health resources that are assigned to host areas needing support in the event of crisis relocation.
5. Prepare a list of State h/m resources to be held in reserve and relocated in support of host area services as the needs arise during the relocation period.
6. Cooperate with Resource and Supply Service, in planning for the movement of essential medical supply stocks to host area medical sites

Relocation Period

1. Coordinate medical activities among host and evacuating jurisdictions.
2. Provide support, including personnel, materials, and facilities to host areas when the relocation begins.
3. Provide additional technical competence and resources to host jurisdictions as the needs arise.
4. Cooperate with Resource and Supply Service in transferring medical supply stocks to appropriate host areas.
5. Monitor State and Local h/m activities, noting difficulties during the relocation period. Incorporate suggestions of local h/m services in State plan revisions and coordinate revision efforts of the local medical care sections.

DEPLOYMENT:

Medical Care personnel and dependants will be relocated to their assigned duty stations. Committed medical care personnel and their dependants will relocate to their assigned duty stations and relocation sites in host areas when the order to begin relocation is received.

Appendix 9
PUBLIC HEALTH

ORGANIZATION:

Deputy Coordinator:
Director of Environmental Health Services:
Director of Public Health Nursing:
Director of Health Education:

REQUIREMENTS:

Water analysis equipment
Vector control equipment
Food establishment surveillance equipment
Disease control supplies and equipment
Laboratory equipment and supplies

RESPONSIBILITIES:

Preparatory Period

1. Plan in cooperation with regional CHP agencies and local h/m services to provide supportive technical competence and h/m resources, and coordination in order to meet the public health and environmental sanitation needs of host and evacuating jurisdictions during crisis relocation.
2. Coordinate plans with resource and Supply Service to provide host areas with increased amounts of public health supplies, e.g., water and sewage treatment chemicals, vaccines, etc., in the event of crisis relocation.
3. Coordinate planning activities among the local public health services as appropriate.
4. Coordinate plans to provide emergency medical services (EMS) with the Fire and Rescue Service.
5. Assign personnel and available resources to host areas requesting support, in the event of crisis relocation.

6. Prepare a list of reserve State personnel and resources to augment local public health services when requested during the crisis relocation period.

Relocation Period

1. Relocate committed public health personnel and resources when the order to begin crisis relocation is received; provide additional support during the relocation period when requested.
2. Coordinate local and risk area public health activities during the relocation period.
3. Assist in and coordinate the movement of health supplies to host areas with the Resource and Supply Service.
4. Cooperate with the Fire and Rescue Service in the provision of EMS during crisis relocation.
5. Monitor State and Local public health activities during the relocation period, making note of problem areas. Revise the public health section accordingly and coordinate the revision of local jurisdiction plans.

EMPLOYMENT

The Colorado Health Department and dependants will relocate to Golden.

Committed public health personnel and dependants will relocate to their assigned duty stations in the host areas when the order to begin relocation is received.

EL PASO COUNTY – COLORADO SPRINGS

CRISIS RELOCATION PLAN

(PROTOTYPE)

ANNEX D

HEALTH AND MEDICAL SERVICE

ANNEX D

Health and Medical Service

I. MISSION

The mission of the El Paso County - Colorado Springs Health and Medical (H/M) Service is to provide primary/emergency medical care and treatment for the ill and injured; to coordinate the consolidation of patients, equipment, and personnel of hospitals, nursing homes, and other health care facilities in the risk area; to coordinate the allocation of medical resources as required to host-area h/m services; to provide public health and environmental sanitation services; and to coordinate the interment of the dead.

II. PARTICIPATION

The organizations participating in the El Paso County - Colorado Springs H/M Service and an indication of their functional relationships are shown in Figure 1.

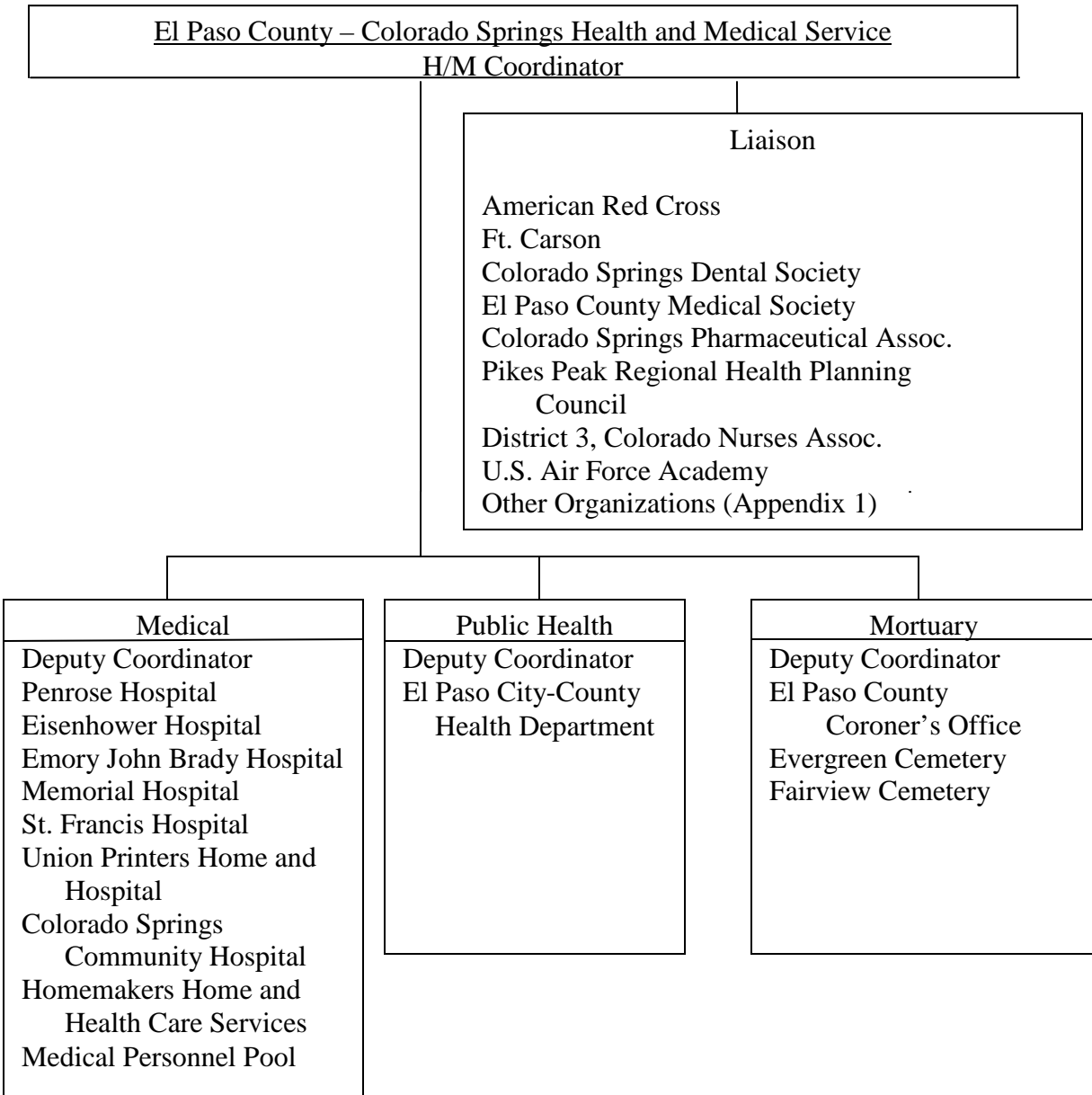


Figure. 1. Colorado Springs – El Paso County Health and Medical Service.

III. SITUATION

Relocation of the risk-area population of El Paso County will occur only at the direction of the governor of Colorado in the event of a threatened disaster. Relocation of the risk-area population will be mandatory and will be to seven host counties and designated parts of El Paso County. Although active-duty military personnel are not covered by the El Paso County - Colorado Springs Crisis Relocation Plan (CRP), their dependants are covered; they will relocate to the Air Force Academy. Population relocation will be carried out over a period of three days and the anticipated duration of the relocation is two weeks. The return of the relocated population to their homes will occur only at the direction of the governor of Colorado.

Operations and missions of the El Paso County - Colorado Springs H/M Service will be carried out during both the preparatory and the relocation time periods. The preparatory period includes the internal readiness and mobilization phases. The relocation period begins when the order for relocation is received from the governor of Colorado. It includes the movement of people, supplies and equipment of the risk area into the host counties and non-risk sections of El Paso County, the time during which people are away from their normal place of residence, and the movement back to El Paso County after the threat of disaster has passed. The principal mode of transportation will be the private motor vehicle.

The 1970 population of El Paso County was approximately 236,000 with 218,000 residents in the risk area and 18,000 residents in the non-risk area. Approximately 14% (30,000) of the risk-area population are active-duty military personnel and are covered by military disaster plans.

Approximately 56,000 persons are military dependents and are assigned to the Air Force Academy, a non-risk area in El Paso County. The remaining 132,000 risk-area residents have been assigned to host areas outside of El Paso County. Critical workers and their families will be relocated to Teller and Fremont Counties; the workers will commute in and out of the risk area daily. Some 18,000 residents will remain in the non-risk area of El Paso County.

Although relocation is mandatory, it is assumed that some of the risk-area residents may refuse to relocate. In addition, relocation of certain “hard-core” patients from risk-area hospitals and nursing care facilities, will be impractical and /or undesirable. Further, medical care must be provided for critical workers. Therefore, it will be necessary to provide medical care services in the risk area for these residents, patients, and critical workers. Medical care must also be available at the four staging areas specified elsewhere in the El Paso County - Colorado Springs CRP. The El Paso County – Colorado Springs H/M Service is responsible for the provision of medical care for the non-risk population of the county as well. Hence, it will be necessary to establish out-patient facilities in the non-risk area. Since the majority of El Paso County residents will be cared for by host counties, the El Paso County- Colorado Springs H/M Service will allocate h/m personnel, equipment, and supplies to the host counties. This will necessitate the consolidation of “hard-core” patients in risk-area hospitals and other health care facilities when feasible. The assignment of physicians, dentists, nurses, and pharmacists to host-area h/m services will be accomplished in cooperation with the El Paso County Medical Society; the Colorado Springs Dental Society; District 3,

Colorado Nurses Association; and the Colorado Springs Pharmaceutical Association, respectively. Assignment of other h/m specialists will also be done in cooperation with the appropriate professional society and/or organization.

IV. RESPONSIBILITIES

A. Office of the H/M Coordination (Appendix 2)

Control of h/m operations will be the responsibility of the H/M Coordinator. The H/M Coordinator will be assisted by Deputy Coordinators for Medical Care, Public Health, and Mortuary Services. The responsibilities of the H/M Coordinator are:

1. To prepare, in cooperation with the Civil Preparedness Coordinator and participating organizations, a plan to provide h/m services for the risk and non-risk populations of El Paso County during the relocation period.
2. To establish liaison with each of the host-area h/m coordinators.
3. To establish liaison with the medical officers-in-charge at Ft. Carson and the Air Force Academy and to develop cooperative arrangements for providing h/m services for military dependents.
4. To establish liaison with the Pikes Peak Chapter, American Red Cross and the El Paso Emergency Medical Service Council to enlist their assistance in the development and implementation of the h/m annex.
5. To establish liaison with other emergency services, i.e., Direction and Control, Law and Order, Fire and Rescue, Resource and Supply, and Reception and care.
6. To enlist the assistance of professional organizations, e.g., the El Paso County Medical Society and District 3 of the Colorado Nurses Association, in the development and implementation of the h/m annex (see appendix 1).
7. To prepare and maintain a roster of h/m personnel residing in El Paso County in cooperation with the Medical Personnel Pool.

8. To provide cards or other identification for essential h/m workers.
9. To coordinate, in conjunction with professional societies and other participating organizations, the assignment of h/m personnel (including physicians, veterinarians, nurses, dentists, pharmacists, medical technologists, morticians, x-ray technicians, optometrists, dental hygienists, public health specialists, chiropractors, osteopaths, hospital administrators, microbiologists, clinical chemists, dietitians, physical therapists, occupational therapists, podiatrists, psychologists, emergency medical technicians, etc.).
10. To plan for and coordinate the allocation of h/m supplies and equipment to host counties and non-risk portions of El Paso County.
11. To plan for and coordinate the relocation of essential h/m personnel and their families to assigned locations in the host counties.
12. To direct h/m operations during crisis relocation.

B. Medical Care

A Deputy H/M Coordinator will be responsible for the planning and provision of medical care during crisis relocation. The Deputy Coordinator will be assisted by representatives of the inpatient, outpatient and emergency departments of hospitals and by representatives of area nursing care facilities. Responsibilities are specified separately for Penrose Hospital, and collectively for St. Francis Hospital, Eisenhower Osteopathic Hospital, Memorial Hospital, and Union Printers Home and

Colorado Springs Community Hospital. Responsibilities are also listed collectively for nursing care facilities in El Paso County. Emory John Brady Hospital, a psychiatric institution is considered separately.

1. Penrose Hospital (Appendix 3)

The responsibilities of Penrose Hospital are:

- a. To prepare a plan to provide medical care for “hard-core” patients and critical workers during the relocation period, including inpatient, outpatient, and emergency medical services.
- b. To participate in planning for the consolidation of “hard-core” patients and personnel during crisis relocation.
- c. To cooperate in determining the assignments of h/m personnel elsewhere in El Paso County.
- d. To cooperate in the planning for allocation of El Paso County h/m personnel, supplies, and equipment to host-area h/m services.
- e. To assist the El Paso City-County Health Department in planning for three health clinics in the non-risk (stayput) area of El Paso County.
- f. To cooperate in planning for the relocation of essential h/m employees of Penrose Hospital and their families to Teller and Fremont Counties in the event of crisis relocation.
- g. To enlist the cooperation and participation of essential h/m employees of Penrose Hospital in these relocation plans.
- h. To plan for the prompt discharge of non-critical patients.
- i. To provide medical care for “hard-core” patients and critical workers during the relocation period.
- j. To arrange with the Law and Order Service for provision of security during the relocation period.

2. Other General Hospitals

The following general hospitals will allocate personnel and other resources as required by the h/m services of the seven host counties: St. Francis Hospital; Eisenhower Osteopathic Hospital; Memorial Hospital; Colorado Springs Community Hospital; and Union Printers Home and Hospital. Their responsibilities are:

- a. To establish a system of patient classification that determines whether a patient will be discharged and relocated with his or her family or transferred to Penrose Hospital in the event of relocation.
- b. To participate in planning for the consolidation of “hard-core” patients by transferring them to Penrose Hospital.
- c. To arrange with the Fire and Rescue Service for transportation of “hard-core” patients from individual general hospitals to Penrose Hospital in the event of relocation.
- d. To cooperate in planning for the allocation of h/m personnel, medical supplies, and equipment for host counties and non-risk areas of El Paso County.
- e. To enlist the cooperation and participation of hospital personnel in these relocation plans.
- f. To cooperate in planning for the relocation of essential h/m employees and their families.
- g. To make arrangements with the Law and Order Service to provide security for hospital during the relocation period.

3. Nursing Care Facilities

There are about 15 nursing care facilities in Colorado Springs with approximately 1300 beds. A number of nursing care facilities patients will

be relocated with their families to host counties. However, many patients will not be relocated with or without their families; continued care will be required for them. The El Paso County Nursing Home Association will assume leadership in coordinating the planning for nursing care facilities.

The responsibility of nursing care facilities are:

- a. To establish a system of patient classification that determines whether a patient will be discharged and relocated with his or her family or transferred to a consolidated nursing care facility in the event of crisis relocation.
- b. To select a facility (or facility) in El Paso County capable of housing and feeding nursing care patients and providing some protection for the patients.
- c. To plan for the consolidation of nursing care facilities by transferring patients to the selected facility(s).
- d. To plan for the transfer of the patients remaining in El Paso County to the consolidated nursing care facility, utilizing ambulances under the direction of the Fire and Rescue Service and/or transportation by the Resource and Supply Service.
- e. To arrange for minimal staffing of the consolidated nursing care facility during relocation.
- f. To provide h/m personnel for utilization in the host counties or non-risk areas of El Paso County.
- g. To enlist the cooperation and participation of nursing care personnel in the preparation of these plans.

- h. To cooperate in planning for relocation of essential h/m employees and their families.

4. Emory John Brady Hospital

This is a 100-bed psychiatric hospital. While some patients can be discharged and relocated, the majority of the patients will not be able to cope with the stress of relocation. For this reason, continued operation of the hospital will be required.

The responsibilities of Emory John Brady Hospital are:

- a. To establish a system of patient classification that identifies those patients who may be discharged in the care of their families and relocated and those patients who must remain hospitalized during the relocation period.
- b. To arrange for minimal staffing during the relocation period.
- c. To identify employees available for assignment to host counties.
- d. To enlist the cooperation and participation of employees in these relocation plans.
- e. To cooperate in planning for relocation of essential psychiatric workers and their families to Teller and Fremont Counties in the event of crisis relocation.

C. Public Health (Appendix 4)

A Deputy Coordinator will head this section. The Deputy Coordinator will be assisted by public health nurses, sanitarians, and other public health specialists. Their responsibilities are:

- 1. To develop a plan for the continuation of essential public health services in El Paso County during the relocation period.

2. To identify and to plan for any emergency public health or environmental sanitation requirements peculiar to crisis relocation.
3. To determine the additional requirements for public health services for Park* and Teller Counties (normally served by the El Paso City-County Health Department), considering their increased population during relocation.
4. To plan for the establishment of three health clinics in the non-risk (stay-put) area of El Paso County, enabling residents to obtain medical attention without entering the risk area.
5. To cooperate in the allocation and assignment of health department personnel to host counties.
6. To plan to safeguard and maintain vital records during crisis relocation.
7. To enlist the cooperation and participation of health department employees in the relocation period.
8. To cooperate in planning for relocation of health department employees and their families in the event of crisis relocation.
9. To continue to provide public health services during the relocation period.
10. To prepare and staff with public health nurses the three health clinics in non-risk areas of El Paso County during the relocation period.

D. Mortuary Service

The El Paso County coroner will serve as Deputy Coordinator for

*Although Park County is not one of the host counties for the El Paso Colorado Springs risk-area, it is normally served by the El Paso City-County Health Department and must, therefore, be considered.

the Mortuary Service. The deputy Coordinator will be assisted by El Paso County morticians and their joint responsibilities are:

1. To develop a plan for the continuation of essential mortuary services in El Paso County during the relocation period, considering emergency measures which may be required in the event that a disaster occurs.
2. To plan for the consolidation of mortuary operations in El Paso County during relocation.
3. To determine the requirements for personnel, supplies, and equipment during the relocation period.
4. To provide personnel for allocation to host counties as required.
5. To make tentative relocation assignments in cooperation with the H/M Coordinator.
6. To enlist the cooperation and participation of mortuary personnel in relocation plans.
7. To participate in planning for relocation of mortuary personnel and their families to relocation sites in the event of crisis relocation.

V. COORDINATION

A. Organization*

Dr. Alfred J. Martin, President, El Paso County Medical Society, is the Health and Medical Service Coordinator. He has overall responsibility for health and medical services in El Paso County - Colorado Springs. He is located in the Main EOC at 203 E. Kiowa.

Dr. Charles Dowding, Director, El Paso City - County Health Department, is Deputy Coordinator for Public Health. He is located at the El Paso City - County Health Department, 501 N. Foote Ave.

Mr. John Gregg, Chief of Staff, Penrose Hospital, is Deputy Coordinator for Medical Care. He is located at Penrose Hospital, 2215 N. Cascade.

Dr. Raoul Urich, El Paso County Coroner, is Deputy Coordinator for Mortuary Services. He is located at the Coroner's Office, E. Pikes Peak and Prospect.

*The person selected as H/M Coordinator should be a physician, respected by his or her colleagues, and capable of enlisting the cooperation and participation of local medical and allied health professionals in the crisis relocation effort. This person could be the president of the local medical society or the director of the health department.

The Deputy Coordinator for Public Health should be an individual familiar with public health and environmental sanitation activities. This person could be the health director, a health administrator, a sanitarian, or a public health nurse.

The Deputy Coordinator for Medical Care could be either a physician or a hospital administrator familiar with overall hospital operations and capable of providing leadership in a disaster situation.

The Deputy Coordinator for Mortuary Services should be thoroughly familiar with local mortuary operations, e.g., the county coroner or local practicing mortician.

B. Location and Phone Number

<u>Organization</u>	<u>Location</u>	<u>Phone Numbers</u>
Main EOC (H/M Coordinator)	230 E. Kiowa	632-1180 632-2210
Support EOC (H/M Coordinator's Representative)	Fire Station No. 9 Garden of the Gods Rd.	598-0154 471-5650
El Paso City-County Health Dept. (Deputy Coordinator-Public Health)	501 N. Foote Ave.	475-8240
Colorado Springs dental Society	1322 N. Academy Blvd.	591-2424
El Paso County Medical Society	1322 N. Academy Blvd.	591-2424
Colorado Springs Pharmaceutical Association	2215 N. Cascade Ave.	475-3366
Pikes Peak Regional Health Planning Council	27 E. Vermijo Ave.	576-6601
District 3, Colorado Nurses Association (Hattie Kirkland)	1912 Myers Ave.	634-4191
Medical Personnel Pool	102 N. Cascade Ave.	471-4225
Homemakers Home and Health Care Services	102 N. Cascade Ave.	634-8828
Emory John Brady Hospital	2135 Southgate Rd.	634-8828
Eisenhower Hospital	33 Barnes Ave.	475-2111
Memorial Hospital	1400 E. Boulder	475-5011
Penrose Hospital (Deputy Coordinator Medical Care)	2215 N. Cascade Ave.	475-2600
St. Francis Hospital	E. Pikes Peak Ave. & Prospect	473-6830
Union Printer's Home and Hospital	Pikes Peak & Union Blvd.	634-3711
Pikes Peak Red Cross	1600 N. Cascade Ave.	632-3563
Colorado Springs Community Hospital	3205 Academy Blvd.	591-2511
EMS Council	1317 N. Academy Blvd.	596-9040

El Paso County Coroner's Office (Deputy Coordinator- Mortuary Services)	E. Pikes Peak & Prospect	473-6830
Evergreen Cemetery	1001 S. Hancock Ave.	471-6646
Fairview Cemetery	1000 S. 26	471-6638

C. Communications

Participating organizations will communicate via commercial telephone facilities. The EOC is linked to the El Paso City-County Health Department by a "hot-line". Organizations having other communication capabilities, e.g., two-way radios, will use them as appropriate and authorized.

D. Reporting Procedures

The H/M Coordinator will contact each of the participating organizations six hours after the governor has ordered relocation to begin to obtain status reports. * Therefore, participating organizations will be contacted every four hours until the end of the third day. Each organization will then be contacted at eight-hour intervals.

E. Action Checklist +

1. Preparatory Period

- a. Review and update the roster of h/m personnel residing in El Paso County.
- b. Review assignments of h/m personnel to the El Paso County-Colorado Springs H/M Service.

*The specific required reports have not been specified yet.

+ It is understood that the H/M Coordinator is ultimately responsible for seeing that the listed actions are taken. However, the Coordinator may be expected to delegate authority for certain of the actions to the Deputy Coordinators.

- c. Contact hospitals, clinics, nursing care facilities, public health facilities, blood banks, laboratories, pharmacies, and other related health facilities in El Paso County and review plans.
- d. Review and update inventories of drugs, medical supplies and equipment, and mortuary supplies and equipment located in El Paso County.
- e. Prepare health advisories and/or instructions for distribution during relocation.
- f. Review and update plans for the delivery of h/m services during relocation, evaluating any change in the requirements of El Paso County and considering the needs of host counties.
- g. Review plans for the consolidation of health care facilities in El Paso County and determine what resources can be allocated to host counties.
- h. Review plans for the continued provision of health and sanitation measures essential to public health.
- i. Make final arrangements for the movement of allocated h/m personnel, medical supplies, and equipment to be assigned host counties during relocation.
- j. Review plans for the assignment of h/m workers to host counties.
- k. Check communication links between the H/M Coordinator and the Deputy Coordinators for Medical Care, Public health and Mortuary services.
- l. Provide identification for essential h/m workers.

- m. Review plans to safeguard vital records located in El Paso County.
 - n. Renew contact with military counterparts responsible for the medical aspects of disaster planning.
 - o. Alert participating organizations when the order for crisis relocation is received.
2. Relocation Period
- a. Consolidate El Paso County hospitals and health care facilities as feasible and coordinate the reporting of h/m personnel to the consolidated facilities.
 - b. Direct the movement of allocated h/m personnel, medical supplies, and equipment to the assigned host counties.
 - c. Continue to provide medical care for individuals remaining in or commuting to the risk and non-risk areas of El Paso County.
 - d. Disseminate health advisories and/or instructions at the onset of the relocation period.
 - e. Establish and operate first-aid stations at the staging areas and health clinics in the non-risk areas of El Paso County
 - f. Provide environmental sanitation services in El Paso County by inspecting staging and work areas, water supplies, sewage treatment, food stocks and feeding facilities.
 - g. Notify host county health departments of the status of communicable diseases in El Paso County at the onset of relocation and continue to maintain communicable disease surveillance throughout the relocation period.

- h. Provide for the interment of the dead.
- i. Safeguard vital records located in El Paso County; continue to record vital events during the relocation period.
- j. Direct the return of h/m workers from their relocation assignments when advised by the governor of Colorado that the relocation period is at an end.
- k. Advise El Paso County hospital and health facilities to return to normal readiness when the relocation period is terminated.
- l. Direct the El Paso City-County Health Department and mortuary facilities to return to normal readiness.
- m. Request that unused supplies and allocated equipment be returned to El Paso County from host counties or from temporary treatment facilities in non-risk areas of El Paso County.
- n. Inventory h/m supplies and equipment within El Paso County and restock as needed.
- o. Request host county h/m services to advise the El Paso City-County Health Department of the existence of any significant public health problems, e.g., communicable diseases, among the returning El Paso County residents.
- p. Evaluate the effectiveness of h/m services during relocation, identifying problems encountered in host counties and El Paso County, and revise the annex accordingly.

Appendix I

OTHER HEALTH AND MEDICAL ORGANIZATIONS

Colorado State Board of Medical Examiners
715 Republic Building
Denver, Colorado 80202

Colorado State Board of Nursing
Room 115, State Services Building
Denver, Colorado 80203

Colorado State Board of Practical Nursing
Room 116, State Services Building
Denver, Colorado 80203

Colorado State Board of Dental Examiners
State Office Building
Denver, Colorado 80203

Colorado State Board of Optometric Examiners
State Services Building
Denver, Colorado 80203

Colorado State Board of Chiropractic Examiners
State Services Building
Denver, Colorado Building 80203

Colorado Dietetics Association
Route 1, Box 560
Evergreen, Colorado 80439

Colorado State Board of Psychologist Examiners
State Services Building
Denver, Colorado 80203

Colorado State Board of Physical Therapists
State Services Building
Denver, Colorado 80203

Colorado State Board of Pharmacy
State Services Building
Denver, Colorado 80203

Colorado Veterinary Medical Association
560 East Evans Avenue, Suite 26
Denver, Colorado

Appendix 2

Office of the H/M Coordinator

ORGANIZATION:

H/M Coordinator: Alfred J. Martin

Deputy Coordinator (Medical Care): John Gregg

Deputy Coordinator (Public Health): Charles H. Dowding, Jr.

Deputy Coordinator (Mortuary Service): Raoul W. Urich

Alternative H/M Representatives (8)*:

REQUIREMENTS:

Communications system (telephone, 2-way radio)

Reference Materials: Annex D, H/M Service; other planning documents;

Telephone directory.

RESPONSIBILITIES:

Preparatory Period

1. Plan for two h/m administrative teams during crisis relocation to staff the EOC and other locations on a 12 hours-on/12 hours-off basis. Provide 24-hour coverage at each subordinate EOC (staging area) with a representative of the H/M Service.
2. Request that each hospital and health care facility prepare a list of essential h/m workers who might be utilized during crisis relocation.
3. Request that the El Paso County Medical Society prepare a list of both active and inactive physicians residing in El Paso County.

*There will be four staging areas in the risk area of El Paso County to be used as computer terminals for critical employees; food and fuel sources; and storage areas for essential equipment. These areas will serve as subordinate control centers and will be staffed by representatives of the various emergency services.

4. Request that District 3 of the Colorado Nurses Association prepare a list of Registered Nurses and Licensed Practical Nurses residing in El Paso County, including information on their activity and employment status.
5. Request that the Colorado Springs Dental Society and the Colorado Springs Pharmaceutical Association prepare similar listings for dentists and pharmacists, respectively.
6. Establish liaisons with hospitals and healthcare facilities in El Paso County, with the Emergency Medical Service Council, with the Pikes Peak Chapter of the American Red Cross with the medical officers-in-charge at the Air Force Academy, Ft. Carson, and Peterson Field, with the various professional health associations represented in El Paso County, with the other emergency services of the El Paso County- Colorado Springs CRP, and with the h/m coordinators of the host counties.
7. Request that the Resource and Supply Service conduct an inventory and inspection of medical resources located in El Paso County, including pharmaceuticals and medical supplies, hospitals, drug stores, veterinary hospitals, etc., and the Packaged Disaster Hospital.
8. Coordinate the assignment of medical supplies and/or equipment to non-risk parts of El Paso County and to host counties.
9. Request that the El Paso City-county Health Department, mortuaries, and health manpower agencies survey their employees in relation to possible crisis relocation assignments.
10. Make crisis relocation assignments for physicians, dentists, and pharmacists in cooperation with the El Paso County Medical Society,

the Colorado Springs Dental Society and the Colorado Springs Pharmaceutical Association, respectively.

11. Make crisis relocation assignments for other h/m workers in cooperation with appropriate professional associations, utilizing the information obtained in surveys and analyzing the requirements for health manpower in El Paso County and the host counties.
12. Coordinate the development of plans by the Medical Care, Public Health, and Mortuary Services for the risk and non-risk population of El Paso County during relocation.
13. Plan for identification of all essential h/m workers.
14. Plan with the assistance of the Pikes Peak Chapter, American Red Cross for the development and implementation of programs to educate and train the public in the principles of first-aid.
15. Request that the El Paso City-County Health Department prepare health advisories and/or instructions for distribution during relocation, emphasizing disease prevention, environmental health and communicable disease control.
16. Plan for a communications network for the El Paso County-Colorado Springs H/M Service.
17. Request that the El Paso City - County Health Department plan for the safeguarding of vital records.
18. Request that the El Paso City-County Health Department plan for the establishment of three health clinics at Falcon, Ellicott, and Monument for use by the non-risk population of El Paso County if crisis relocation is ordered.
19. Request the Pikes Peak Chapter, American Red Cross to plan for the establishment and staffing of first-aid stations at the four staging areas in El Paso County.

20. In cooperation with the Law and Order Service, plan for security measures for risk area h/m facilities during the relocation period.

Relocation Period

1. Advise the H/M Service to begin relocation operations if crisis relocation is ordered.
2. Request transfer of the PDH from storage to the Air Force Academy.
3. District area hospitals and nursing care facilities to discharge all able patients; as feasible transfer remaining general hospital patients to Penrose Hospital; and transfer remaining nursing care patients to the Broadmoor Hotel (a facility which might be used for the consolidation of nursing care facilities and patients) as feasible.
4. Direct Emory John Brady Hospital to discharge all able patients and consolidate the hospital units, thus allowing minimal staffing to care for the remaining patients.
5. Advise the host counties of the status of communicable diseases in El Paso County at the onset of the relocation period.
6. Direct the relocation of h/m personnel and their families to Fremont or Teller Counties or to other host counties as assigned.
7. Direct h/m workers to report to their assignments once they have relocated.
8. Direct the El Paso City-County Health Department to ready health clinics at Falcon, Ellicot and Monument.
9. Request the Pikes Peak Chapter, American Red Cross to activate first-aid stations at the staging areas and staff the stations throughout the relocation period.

10. Arrange for the distribution of health instructions at the staging areas and at various points along the relocation routes.
11. Request that the Resource and Supply Service move medical supplies and/or equipment to h/m facilities in the non-risk areas of El Paso County or to assigned locations in the host counties.
12. Coordinate the provision of h/m services in El Paso County by Penrose Hospital, first-aid stations, clinics, the El Paso City-County Health Department, and the Mortuary Service during the relocation period.
13. Direct the return of h/m workers and their families from their relocation assignments when the order is received for crisis relocation to end.
14. Advise El Paso County hospital and health facilities to return to normal readiness when the relocation period is terminated.
15. Direct the El Paso City-County Health Department and the Mortuary Service to return to normal readiness when crisis relocation has ended.
16. Request that unused supplies and allocated equipment be returned to El Paso County from host counties and from temporary treatment facilities in non-risk El Paso County.
17. Advise organizations to inventory h/m supplies and equipment within El Paso County and restock as needed.
18. Request that host county h/m services advise the El Paso City- County Health Department of the existence of any significant public health problems, e.g., communicable diseases, among returning El Paso County residents.
19. Review H/M Service performance during crisis relocation to identify problems encountered; revise the annex accordingly.

DEPLOYMENT:

Team 1 reports to the main EOC and to subordinate EOC's (staging areas) while Team 2 relocates with their families to Teller or Fremont County. Team 2 reports to EOC's while Team 1 relocates with their families to Teller or Fremont County. Continuous coverage throughout crisis relocation at EOC's.

Appendix 3
Penrose Hospital

ORGANIZATION:

Hospital Director: Gerald Tuborg

Hospital Administrator: Sister Myra James

Director of Inpatient Services: A. F. Schaefer

Director of Outpatient Services: Joseph Carling

Director of Emergency Medical Services: Rachel Quinn

REQUIREMENTS:

Pharmaceuticals, refrigeration, alternate generator, communications system, sterile supplies, emergency resuscitation equipment, monitoring equipment, EKG machine, and laboratory, radiology, dietary, operating room, and laundry supplies and equipment.

RESPONSIBILITIES:

Preparatory Period

1. Prepare a list of essential hospital employees, including their addresses and telephone numbers.
2. Survey the employees of Penrose Hospital to determine tentative crisis relocation assignments.
3. Prepare a disaster plan for the provision of medical care during the relocation period, including provisions for inpatient, outpatient and emergency medical services.
4. Maintain current inventories of pharmaceuticals, medical supplies, and equipment at Penrose Hospital.
5. Maintain all equipment at the required levels of performance.
6. In conjunction with the area blood banks and centers, assist in maintaining adequate amounts of blood by participating

in blood bank programs.

7. Conduct training exercises for hospital employees to improve their emergency medical competency and efficiency.
8. Review the disaster plan to determine that the requirements for manpower, medical supplies, and equipment can be met by the anticipated available resources during the relocation period. Request additional allocations if indicated.
9. Plan to relocate essential h/m workers and their families to Teller and Fremont Counties in the event of crisis relocation.
10. Assist the El Paso City-County Health Department, if requested, in the preparations for health clinics to be operated at Falcon, Ellicott and Monument during the relocation period.
11. Assist the Pikes Peak Chapter, American Red Cross, if requested, in the preparations for first-aid stations to be operated at the staging areas during the relocation period.
12. Prepare to discharge able patients and make final preparations to receive “hard-core” patients transferred at the onset of the relocation period.
13. Enlist the cooperation and participation of essential h/m employees of Penrose Hospital in the relocation plan.

Relocation Period

1. Relocate all essential h/m workers and their families to Teller or Fremont Counties at the onset of crisis relocation.
2. Discharge all able patients and receive “hard-core” patients transferred from the other general hospitals in Colorado Springs.
3. Continue to provide medical care services for El Paso County throughout the relocation period.

4. Provide personnel, if requested, to staff the health clinics in the non-risk areas of El Paso County.
5. When the crisis relocation period is over, recall any h/m personnel allocated to the health clinics.
6. Advise the relocation h/m workers of Penrose Hospital to return to their homes in El Paso County.
7. Return to normal operations when the relocation period is over.
8. Identify the problems encountered throughout the relocation period by Penrose Hospital in order that future revisions may be made to the El Paso County - Colorado Springs CRP, H/M Service Annex.

DEPLOYMENT:

Relocate essential h/m workers of Penrose Hospital with their families to Teller or Fremont Counties.

Provide continuous coverage at Penrose Hospital during the relocation period by organizing the staff to two twelve-hour shifts. H/M workers assigned to non-risk parts of El Paso County or to host counties report to their duty stations.

Appendix 4
El Paso City-County Health Department

ORGANIZATION:

Director: Charles H. Dowding, Jr.

Assistant to Director: Joel Phillips

Division of Environmental Health Services: Frank A. Otoupalik

Division Of Nursing: Marian Alt

Division of Health Education: Joel Phillips

REQUIREMENTS:

Water analysis equipment (e.g., membrane filters, test kits)

Vector control equipment (e.g., insecticides, rodenticides, spraying equipment)

Food establishment surveillance (e.g., thermometers, flashlights)

Disease control supplies and equipment (e.g., vaccines, syringes, needles, etc.)

Laboratory equipment and supplies (e.g., medical microbiology, serology, mycology, and sanitary microbiology)

RESPONSIBILITIES:

Preparatory Period

1. Plan for continued provision of public health services, personnel, equipment and supplies in accordance with the anticipated population in El Paso, Teller and Park Counties during the relocation period.

Services to be provided include the following:

Monitoring water supplies

Communicable disease surveillance and control (including immunization as appropriate)

Vector control (insect and rodent)

Laboratory services related to disease diagnosis, treatment, and control

Public health nutrition services

Monitoring food service establishments

Surveillance of sanitary conditions in housing (especially congregate care facilities)

Monitoring solid waste disposal

Monitoring sewage disposal

Keeping and safeguarding vital statistics

Health education with emphasis on disease prevention and promotion of health.

2. Plan for the establishment of health clinics at Falcon, Ellicott, and Monument. Make arrangements with the Resource and Supply Service to supply and equip the health clinics. Prepare staffing plans in conjunction with the El Paso County Medical Society and other professional societies, as appropriate.
3. Determine the communicable disease status of the risk area and report to the H/M Service Coordinator.
4. List all public health employees and specify their assignments for crisis relocation; anticipate manpower shortages and recruit additional personnel to serve as aides or assistants to regular health department employees.
5. Assess ability to provide assistance to host counties in meeting their public health needs.
6. Arrange a schedule of work shifts for employees.
7. Arrange for employees, especially those traveling in and out of risk area, to have identification cards designating them as public health workers.

8. Arrange for employees and their dependants to be relocated to either Fremont or Teller County.

Relocation Period

1. Provide public health services within El Paso (Including the Air Force Academy), Park, and Teller counties in proportion to their relocation period populations. (For example, Teller County may require additional manhours of work due to its' increased population).
2. Establish health clinics at Falcon, Ellicott, and Monument with assistance from the Resource and Supply Service.
3. Provide assistance to host counties that request it, as resources permit.
4. Periodically, report status to the Deputy Coordinator for Public Health.
5. During step-down operations, continue to provide public health services, shifting emphasis gradually back to the risk area as people leave the host areas and return to El Paso County.
6. Assess the communicable disease status of returning relocatees to determine if steps need to be taken to prevent disease outbreaks in the risk area.
7. Return to normal operations as the situation permits.

DEPLOYMENT:

Health Department employees and dependents will relocate to either Fremont County or Teller County.

Health Department employees will work out of their Colorado Springs,

Fairplay, Bailey, and Cripple Creek offices and continue to serve Park and Teller Counties, and both risk and non-risk areas of El Paso County, including the Air Force Academy, throughout the relocation period.

The Health Department will provide public health nurses for the health clinics at Falcon, Ellicott, and Monument during the relocation period.

Certain Health Department employees may be deployed to host counties other than Park and Teller during the relocation period.

Appendix 5
American Red Cross (Pikes Peak Chapter)

ORGANIZATION:

Chapter Director: Jay Daniels

Chapter Assistant Director: Ben Henry

REQUIRMENTS:

Medical and nursing care equipment and supplies

RESPONSIBILITIES:

Preparatory Period

1. Plan for the establishment of first-aid stations at each of the four staging areas, taking into consideration supplies, equipment and staffing (one or two persons at each station should be adequate).
2. Plan to augment, as resources permit, other Red Cross chapters, including chapters at the Air Force Academy, Teller, Fremont Counties, and other host counties.
3. Continue training courses in first-aid.

Relocation Period

1. Establish and staff first-aid stations at staging areas.
2. If resources exist, and other Red Cross Chapters request assistance, provide aid in whatever form possible.

DEPLOYMENT:

Red Cross will staff first-aid stations at staging areas throughout relocation period. First-aid station staffs will relocate to either Fremont or Teller Counties with their dependents and commute in and out of the risk area.

Some workers may be assigned to other Red Cross chapters, e.g., at the Air Force Academy or in the host counties.

FREMONT COUNTY
CRISIS RELOCATION PLAN
(PROTOTYPE)

ANNEX D

HEALTH AND MEDICAL SERVICE

ANNEX D

Health and Medical Service

I.MISSION AND FUNCTIONS

The mission for the Fremont County Health and Medical (H/M) Service is to provide primary and emergency medical care for the ill and injured; to provide in- and outpatient services by expanding the capacity of existing health care facilities and converting other facilities to temporary health facilities; to provide public health and environmental sanitation services; and to coordinate the interment of the dead and related services. The Fremont County H/M Service will coordinate the utilization of all h/m resources, including personnel, supplies, and equipment allocated by the evacuating jurisdiction.

In order to accomplish the mission, the following basic functions are required:

Preparatory Period

1. Identify and inventory existing h/m resources including personnel supplies and equipment, health facilities, communications, etc., and coordinate plans with the evacuating and state jurisdictions for the augmentation of existing services.
2. Plan for the rapid discharge of able patients from existing health care facilities, e.g., hospitals and nursing homes; plan to convert other facilities, e.g., clinics, veterinary hospitals, hotels, and motels, to temporary patient care facilities, as feasible; and expand the capacity of existing health care

facilities, e.g., by use of the Packaged Disaster Hospital (PDH) in conjunction with an existing facility.

3. Plan for the utilization of allocated public health personnel, supplies and equipment to provide most of the needed health and environmental sanitation services, including surveillance of water and sewage disposal systems, vector control measures, communicable disease surveillance, etc.
4. Plan to coordinate mortuary services in order to provide for interment of the dead, graves registration, etc.
5. Deploy h/m personnel to assigned posts once the order to begin crisis relocation is received.

Relocation Period

1. Discharge able patients, expand the capacity of existing facilities, and establish temporary health care facilities.
2. Utilize h/m resources allocated by the evacuating jurisdiction.
3. Request support from the state, as necessary.
4. Monitor water supplies, implement communicable disease surveillance and control measures, monitor sanitary conditions in congregate care facilities, educate public on matters of disease prevention, etc.
5. Provide mortuary services, i.e., identification, registration, burial, etc.
6. Upon receipt of official advice that the relocation period has ended, begin a step down of operations and return to normal readiness as the situation allows.

II. PARTICIPATION

The organization participating in the Fremont County H/M Service and an indication of their functional relationships are shown in Figure 1.

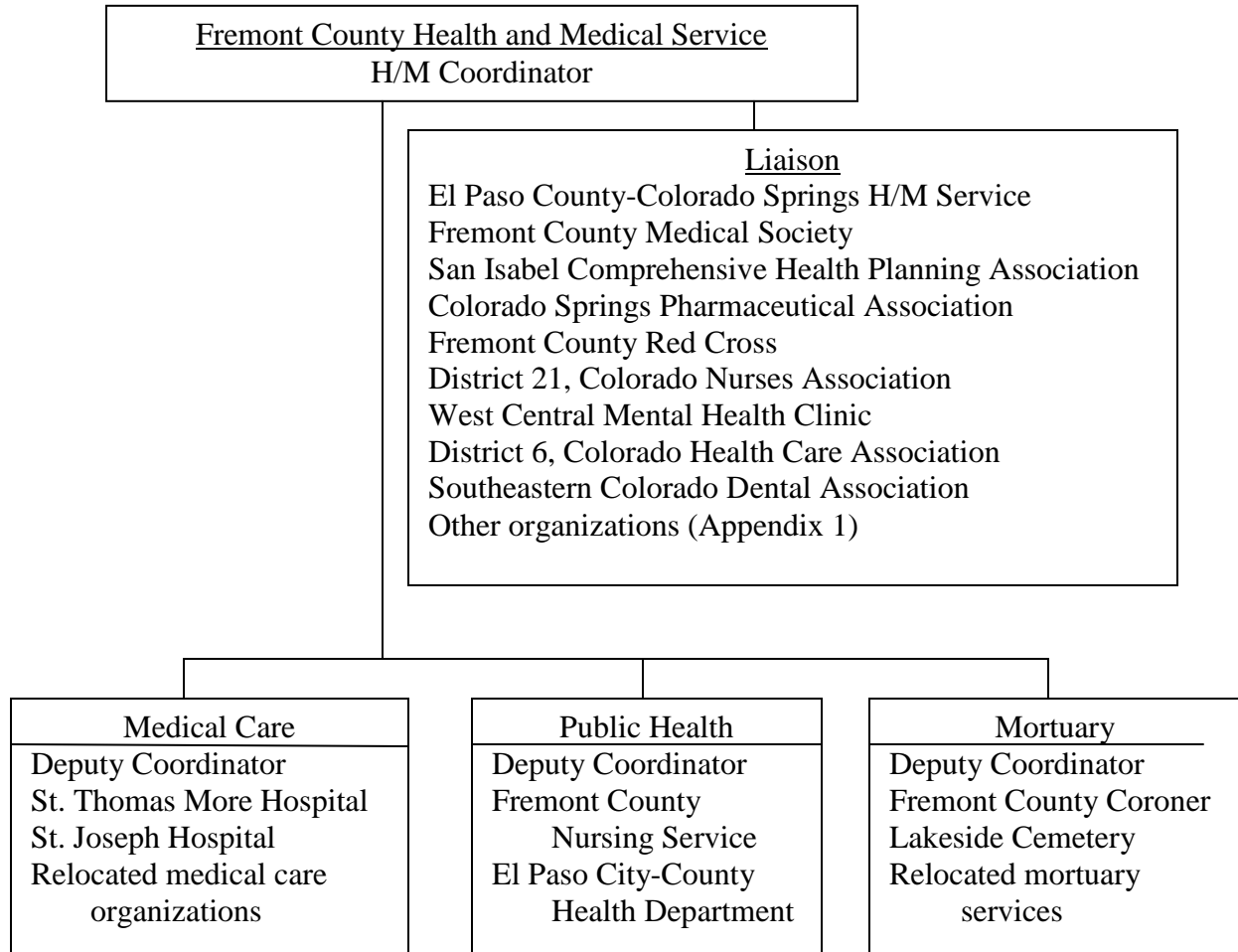


Figure 1. Fremont County Health and Medical Service.

III. SITUATION

The governor of Colorado had authority to direct the relocation of a population, in this instance the El Paso County-Colorado Springs population, in the event of a threatened natural or man-made disaster. Relocation of the risk area (El Paso County-Colorado Springs) will be mandatory and will be to seven host counties (including Fremont County) and designated parts of El Paso County. The population at risk will relocate over a three-day period. The relocated population is expected to be away from the risk area and in the host areas for about two weeks.

The operations of the Fremont County H/M Service will take place during both the preparatory and relocation time periods. The preparatory period includes internal readiness and mobilization phases. The relocation period begins with the order from the governor of Colorado to evacuate and includes the movement of people out of the risk and into the host areas, the time spent in the host area away from their normal place of residence, and the return of the population to Colorado Springs after the threat of disaster has passed. This movement of people will be accomplished primarily with private motor vehicles.

Fremont County is one of the seven host counties for the Colorado Springs risk area. It has a population of about 22,000, located mainly in the eastern part of the county in Canon City and Florence. Smaller population centers include Rockvale, Coal Creek, Williamsburg, and East Canon. Thirty-two percent of the population is rural.

About 38,500 people from the El Paso County-Colorado Springs risk area will be relocating to Fremont County. Many of these people are critical workers or their dependents. Critical workers will commute back and forth in 12-hour shifts to the evacuated, risk area to operate certain essential facilities and activities in order to provide essential goods and services and to maintain the security and integrity of the evacuated area.

In addition to the 38,500 people relocating to Fremont County, about 37,500 evacuees will travel through Fremont County, via State Highway 115 and U.S. Highway 50, on their way to other host counties. Two rest areas will be established for the transients; one at the Fremont County Airport on U.S. 50, and the other adjacent to Royal Gorge Park. First-aid stations will be located at these two rest areas to provide limited medical services for transients.

Health facilities that are expected to provide h/m services for residents and relocatees in Fremont County include two general hospitals; one in Canon City and the other in Florence. There are also two State prison infirmaries in Canon City that could possibly be utilized under extreme circumstances. The other population centers and rural areas of Fremont County lack health facilities. Therefore, it will be necessary to expand the capacity of existing facilities and create temporary health facilities to handle the larger population during crisis relocation.

Like many other counties throughout Colorado, there is no organized health department in Fremont County. The Fremont County Nursing Service and a county pest control officer provide the public health services.

About once a month, consultants in public health nursing and environmental health from the Colorado Department of Public Health visit Fremont County to provide technical assistance.

Fremont County will have greatly increased needs during relocation due to its increased population. Based on the total number of people to be served, and using “desired” ratios of resource units to population, relocation needs were estimated. By comparing the estimated h/m needs with the community’s available resources, resource deficits were determined. Table 1 gives estimates of the manpower and hospital bed needs and deficits for Fremont County based on the anticipated relocation period population.

It is assumed that since the El Paso County-Colorado Springs area will have greatly reduced h/m needs, an appropriate amount of resources from there will be allocated to Fremont County and that the State will also provide resources.

Table 1
CRISIS RELOCATION NEEDS AND DEFICITS FOR FREMONT COUNTY*

H/M Resources	Desired ratio (Resources units to population)	Estimated needs	Existing resources	Resource deficits
Physicians	1/1000	60	23	37
RN's	3.5/1000	210	78	132
LPN's	1.8/1000	108	62	46
Dentists	.57/1000	34	9	25
Pharmacists	.63/1000	38	15	23
Beds	5/1000	300	94	206

* Estimates are based on the following:

Fremont County resident population	-	21,942
Relocates to Fremont County	-	38,500
Total crisis relocation population	-	60,442

IV. RESPONSIBILITIES

A. Office of the H/M Coordinator (Appendix 2)

Overall control of h/m operations will be the responsibility of the H/M Coordinator. The H/M Coordinator will be assisted by Deputy Coordinators for Medical Care, Public Health and Mortuary Services.

The responsibilities of the H/M Coordinator are:

1. To prepare and implement, in cooperation with the Civil Preparedness Coordinator and participating organizations, a plan to provide h/m services for the resident and evacuee populations of Fremont County during the relocation period.
2. To establish liaison with the El Paso County-Colorado Springs H/M Coordinator to coordinate planning efforts.
3. To establish liaisons with other emergency services, i.e., Direction and Control, Law and Order, Fire and Rescue, Resource and Supply, and Reception and care.
4. To prepare and maintain a roster of the h/m personnel residing in Fremont County.
5. To prepare and maintain a list of Fremont County health facilities, including general hospitals and nursing homes, and facilities that could serve as temporary health facilities in the event of a relocation, and the patient capacity of each.
6. To establish liaison with the State H/M Service.
7. To plan for and coordinate, in conjunction with participating organizations in Fremont County and with the El Paso County-Colorado Springs H/M Service, the augmentation of Fremont County

- h/m services with resources allocated from the evacuating jurisdiction.
8. To plan for and coordinate, in cooperation with the Resource and Supply Service, the movement of allocated h/m supplies and equipment from the El Paso County-Colorado Springs area.
 9. To plan for and initiate requests to the State for h/m support, as necessary.
 10. To provide means of identification for Fremont County h/m personnel.
 11. To direct h/m operations during the crisis relocation period.

B. Medical Care

A Deputy H/M Coordinator will be responsible for the planning and provision of medical care during crisis relocation. The Deputy Coordinator will be assisted by representatives of the inpatient, outpatient, and emergency departments of hospitals and by representatives of area nursing care facilities. Responsibilities are specified separately for St. Thomas More Hospital and St. Joseph Hospital. Nursing care facilities are considered collectively for Fremont County.

1. St. Thomas More Hospital (Appendix 3)

The responsibilities of St. Thomas More Hospital are:

- a. To prepare a plan to discharge all able patients in order to increase the quantity of beds and other resources available for the care of the more seriously ill.
- b. To plan for the expansion of present capacity to accommodate increased patient loads during relocation using on-hand supplies and equipment and the PDH located in Florence.

- c. To participate in planning for the allocation of h/m personnel, supplies and equipment from the El Paso County-Colorado Springs area to Fremont County.
- d. To establish plans to receive assistance from the State and evacuating jurisdictions through the H/M Coordinator during relocation.
- e. To assist the Red Cross and County Nursing Service in providing first-aid stations at the two rest areas.
- f. To prepare a plan for the increased collection and processing of blood.

2. St. Joseph Hospital

The responsibilities of St. Joseph Hospital are:

- a. To prepare a plan for the prompt discharge of all able patients.
- b. To plan to expand the hospital's capacity to accommodate an increased patient load during relocation.
- c. To participate in planning for the allocation of h/m personnel, supplies, and equipment from the El Paso County-Colorado Springs area to Fremont County.
- d. To establish plans to receive additional assistance from State and evacuating jurisdictions during relocation.

3. Nursing Care Facilities

The six nursing care facilities (excluding residential care facilities) in Fremont County contain about 500 beds, some of which could serve as temporary hospital beds during a crisis relocation. District 6 of the Colorado Health Care Association will assume leadership in coordinating the planning for nursing care facilities. The responsibilities of nursing care facilities are:

- a. To establish a system of patient classification to indicate whether or not a patient can be discharged in the event of crisis relocation.
- b. To plan for the use of nursing care facilities as temporary hospitals.
- c. To cooperate in planning for the allocation of h/m personnel, supplies and equipment from the El Paso County-Colorado Springs area to Fremont County nursing facilities.
- d. To establish plans for requesting additional support during crisis relocation, as necessary.

C. Public Health (Appendix 4)

A deputy Coordinator for Public Health will head this section. The Deputy Coordinator will be assisted by public health nurses and the Fremont County sanitation officer. The responsibilities of the Deputy Coordinator for Public Health are:

1. To develop a plan providing for the continuation of public health services in Fremont County during the relocation period.
2. To identify and plan for any public health or sanitation requirements peculiar to crisis relocation.
3. To participate in planning for the allocation of El Paso City-County Health Department personnel, supplies, and equipment to Fremont County during crisis relocation.
4. To plan for the utilization of the allocated resources.
5. To establish procedures to request and receive additional support from the State during crisis relocation, as necessary.

D. Mortuary Service

A Deputy Coordinator for Mortuary Services will head this section. He will be assisted by other Fremont County morticians. Their responsibilities are:

1. To plan for the provision of mortuary services for the larger population present during crisis relocation.
2. To determine the personnel, supply, and equipment requirements for the relocation period and the means of fulfilling those requirements, e.g., through assistance from the State or the El Paso County-Colorado Springs area.
3. To plan for the utilization of mortuary personnel relocated to Fremont County.

V. COORDINATION

A. Organization*

Dr. J.S. Hildebrand, President, Fremont Medical Society, is the Health and Medical Service Coordinator. He has overall responsibility for h/m services in Fremont County. He is located at the EOC at 409 Macon Av., Canon City, Colorado.

Mrs. Madeline Randall, Public Health Nurse, Fremont County Nursing Service, is the Deputy Coordinator for Public Health. She is located at the Fremont County Courthouse, Canon City, Colorado.

Sister Judith Kuhn, Administrator, St. Thomas More Hospital, is Deputy Coordinator for Medical Care. She is located at St. Thomas More Hospital, 1019 Sheridan, Canon City, Colorado.

Dr. Henry Grabow, Coroner, Fremont County, is the Deputy Coordinator for Mortuary Services. He is located at 116 N 7, Canon City, Colorado.

*The person selected as H/M Coordinator should be a physician, respected by his or her colleagues, and capable of enlisting the cooperation and participation of local medical and allied health professionals in the crisis relocation effort. This person could be the president of the local medical society or the director of the health department.

The Deputy Coordinator for Public Health should be an individual familiar with public health and environmental; sanitation activities. This person could be the health director, a health administrator, a sanitarian, or a public health nurse.

The Deputy Coordinator for Medical Care could be either a physician or a hospital administrator familiar with overall hospital operations and capable of providing leadership in a disaster situation.

The Deputy Coordinator for Mortuary Services should be thoroughly familiar with local mortuary operations, e.g., the county coroner or a local practicing mortician.

B. Location and Phone Numbers

<u>Organization</u>	<u>Location</u>	<u>Telephone Numbers</u>
EOC (H/M Coordinator)	409 Macon Av., Canon City	275-2424
St. Thomas More Hospital (Deputy Coordinator- Medical Care)	1019 Sheridan, Canon City	275-3381
Fremont County Nursing Service (Deputy Coordinator- Public Health)	Fremont County Courthouse Canon City	275-6373
Fremont County Coroner (Deputy Coordinator- Mortuary Service)	116 N 7, Canon City	275-2867
San Isabel Comprehensive Health Planning Association	425 ½ Main, Canon City	275-8350
St. Joseph Hospital	600 W 3, Florence	784-6361
Lakeside Cemetery	1008 Elm Av., Canon City	275-5725
First Aid Station	Fremont County Airport	784-9962
First Aid Station	Royal Gorge Park	275-7507
West Central Mental Health Clinic, Inc.	323 N 6, Canon City	275-6400
Canon City Foot and Leg Clinic	606 Yale Pl.	275-4777
Fremont County Red Cross (Doyle Dambaugh)	826 Beech Ave., Canon City	275-9690
District 21, Colorado Nurses Assn. (Betty Barrows)	322 E 2, Florence	784-3958
Colorado Springs Pharmaceutical Assn.	2215 N. Cascade Av., Colorado Springs	475-3366
Southeastern Colorado Dental Society (Dr. James Swanson)	1325 S. Prairie N., Pueblo	564-0990

C. Communications

Participating organizations will communicate via commercial telephone facilities. The Sheriff's office (EOC) has two-way radio contact with the State Patrol.

D. Reporting Procedures

The H/M Coordinator will contact each of the participating organizations six hours after the governor of Colorado has ordered relocation to begin to obtain status reports. Thereafter, participating organizations will be contacted every four hours if feasible until the end of the third day. Each organization will then be contacted at eight-hour intervals.

E. Action Checklist*

1. Preparatory Period

- a. Review and update the roster of h/m personnel residing in Fremont County.
- b. Review assignments of h/m personnel to the Fremont County H/M Service.
- c. Contact hospitals, nursing homes, public health facilities, pharmacies, and other related facilities in Fremont County and review plans.
- d. Review and update inventories of drugs, medical supplies, and equipment, and mortuary supplies and equipment located in Fremont County.
- e. Prepare health advisories and/or instructions for

* It is understood that the H/M Coordinator is ultimately responsible for seeing that the listed actions are taken. However, the coordinator may be expected to delegate authority for certain of the actions to Deputy Coordinators.

distribution during relocation.

- f. Review and update plans for the delivery of h/m services during relocation, evaluating any change in the requirements of Fremont County and considering any alterations in the El Paso County-Colorado Springs area plan.
 - g. Review the El Paso County-Colorado Springs plans for allocation of h/m personnel, supplies, and equipment to Fremont County and the plans to utilize the resources.
 - h. Review plans to request and receive support from the State.
 - i. Review plans to expand existing hospital capacities (including the use of the PDH) and to establish temporary hospitals.
 - j. Review plans for the provision of health and sanitation measures essential to public health.
 - k. Provide identification for h/m workers.
 - l. Check communication links between the H/M Coordinator and Deputy Coordinators for Medical Care, Public Health, and Mortuary Services.
 - m. Alert participating organizations when the order to begin crisis relocation is received.
2. Relocation Period
- a. Expand capacity of existing hospitals, establish temporary hospitals at other health and non-health facilities, and set up the PDH.
 - b. Coordinate the utilization of allocated h/m personnel, supplies, and equipment.

- c. Distribute health advisories and/or instructions to population centers receiving evacuees.
- d. Establish and operate the first-aid stations at the two rest areas in Fremont County.
- e. Provide public health and environmental sanitation services in Fremont County.
- f. Request information concerning the status of communicable disease surveillance throughout the relocation period.
- g. Provide for the interment of the dead.
- h. Request State assistance as the situation demands.
- i. Alert participating organizations that crisis relocation has ended and direct the return of Fremont County h/m workers to normal readiness.
- j. Return any unused allocated supplies and equipment to the State or to El Paso County-Colorado Springs.
- k. Inventory h/m supplies and equipment and restock as needed.
- l. Alert El Paso City-County Health Department of any significant public health problems, e.g., communicable diseases, among the returning relocatees.
- m. Evaluate the effectiveness of the h/m services, identifying problems encountered during relocation, and revise the annex accordingly.

Appendix 1

OTHER HEALTH AND MEDICAL ORGANIZATIONS

Colorado State Board of Medical Examiners
715 Republic Building
Denver, Colorado 80202

Colorado State Board of Nursing
Room 115, State Services Building
Denver, Colorado 80203

Colorado State Board of Practical Nursing
Room 116, State Services Building
Denver, Colorado 80203

Colorado State Board of Dental Examiners
State Office Building
Denver, Colorado 80203

Colorado State Board of Optometric Examiners
State Services Building
Denver, Colorado 80203

Colorado State Board of Chiropractic Examiners
State Services Building
Denver, Colorado 80203

Colorado Dietetics Association
Route 1, Box 560
Evergreen, Colorado 80439

Colorado State Board of Psychologist Examiners
State Services Building
Denver, Colorado 80203

Colorado State Board of Physical Therapists
State Services Building
Denver, Colorado 80203

Colorado State Board of Pharmacy
State Services Building
Denver, Colorado 80203

Colorado Veterinary Medical Association
560 East Evans Avenue, Suite 26
Denver, Colorado

Appendix 2

Office of the H/M Coordinator

ORGANIZATION:

H/M Coordinator: Dr. J.S. Hildebrand
Deputy Coordinator (Medical Care): Sister Judith Kuhn
Deputy Coordinator (Public Health): Mrs. Madeline Randall
Deputy Coordinator (Mortuary Service): Dr. Henry Grabow

REQUIRMENTS:

Communications system (telephone primarily)
Reference Materials: planning documents; resources list; telephone directories

RESPONSIBILITIES:

Preparatory Period

1. Plan for two h/m administrative teams during crisis location to staff EOC on a 12 hours-on and 12 hours-off basis.
2. Establish a liaison with the various professional health associations located in Fremont County (or including Fremont County in their jurisdictions), with the other participating organizations, e.g., emergency medical services, with the other emergency services of the Fremont County CRP, e.g., the Law and Order Service, and with the El Paso County-Colorado Springs H/M Service Coordinator.
3. Establish liaison with all health facilities, e.g., hospitals and nursing homes, in Fremont County and determine the crisis relocation capabilities of each.
4. Establish liaison with the State H/M Service.
5. Request that hospitals and other health facilities prepare lists of h/m workers who might be utilized during crisis relocation.
6. Request that the Fremont County Medical Society prepare a list of all active and inactive physicians residing in Fremont County.

7. Request that district 21, Colorado Nurses Association, prepare a list of Registered Nurses and Licensed Practical Nurses residing in Fremont County, including information on their activity and employment status.
8. Request that the Southeastern Colorado Dental Society and the Colorado Springs Pharmaceutical Association prepare similar listings for dentists and pharmacists, respectively, in Fremont County.
9. Assign h/m personnel to CRP duty stations in cooperation with the appropriate professional societies and/or organizations.
10. Identify other facilities such as schools, hotels, veterinary hospitals, that might be used as temporary health care facilities and establish contact with them.
11. Request that Fremont County Coroner to prepare a list of all mortuary services.
12. Request that the Resource and Supply Service conduct an inventory and inspection of health and medical resources located in Fremont County, including pharmaceuticals and medical supplies, pesticides, drug stores, veterinary hospitals, etc., and the PDH.
13. Request that St. Thomas More Hospital prepare and maintain a list of potential blood donors in Fremont County, including donor's blood type, address, and telephone number.
14. Update lists of personnel, facilities and other resources periodically in cooperation with the appropriate participating organizations.
15. Plan, with the assistance of Red Cross, to institute programs to educate the public in the principles of first-aid.
16. Request that the Fremont County Nursing Service, and the county sanitation officer prepare health instructions for distribution

during crisis relocation, emphasizing communicable disease prevention and control, and environmental sanitation.

17. Plan for the identification of Fremont County h/m personnel.
18. Plan, in cooperation with the Resource and Supply Service, for the movement of the PDH from Florence to Canon City in the event of crisis location.
19. Direct and coordinate the development of plans prepared by the Medical Care, Public Health, and Mortuary Service sections to provide for the h/m needs of the residents and the relocated population during crisis relocation.
20. Plan for communications with members of the Fremont County H/M Service and with key individuals of the other emergency services, e.g., Fire and Rescue.
21. Identify, in cooperation with Medical Care, Public Health, and Mortuary Services, areas where resource deficits are anticipated. Communicate resource needs to the State and El Paso County-Colorado Springs; seek agreements to provide this assistance.

Relocation Period

1. When the relocation order is received, notify key h/m personnel of the Fremont H/M Service to begin crisis relocation operations.
2. Request personnel, supplies and equipment from the State and the El Paso County-Colorado Springs area according to plans.
3. Request that the Resource and Supply Service transfer the PDH from Florence to Canon City to be used in conjunction with St. Thomas More Hospital.

4. Direct area hospitals and nursing homes to discharge all able patients and to be prepared to accept patients.
5. Direct St. Thomas More Hospital, in cooperation with the Fremont County Red Cross, and County Nursing Service to establish a first-aid station at each of the two rest areas.
6. Arrange for the distribution of health instructions throughout Fremont County.
7. As relocation progresses, advise the State of any needs which arise.
8. Keep other emergency services in Fremont County informed of the status of the various H/M Service activities.
9. Coordinate h/m services throughout the relocation period.
10. When the order is received for crisis relocation to end, notify each section of the H/M Service.
11. Direct hospitals, nursing homes, the Fremont County Nursing Service and other services to step down operations as appropriate.
12. Direct health service units to inventory all drugs, medical supplies and equipment to determine if resupply is necessary; excess amounts should be returned to the appropriate donor.
13. Notify the El Paso County-Colorado Springs H/M Service Coordinator of any communicable disease outbreaks that occurred during the relocation period.
14. Evaluate the effectiveness of crisis relocation period activities; determine areas of weakness; and alter h/m plans accordingly.

DEPLOYMENT: The H/M Coordinator and his alternate will locate at the EOC for a 12-hour shift each.

Appendix 3
St. Thomas More Hospital

ORGANIZATION:

Administrator: Sister M. Judith Kuhn

Assistant Administrator: Mr. Paul Masar

REQUIREMENTS:

Pharmaceuticals, refrigeration, alternate generator, communications system, sterile supplies, emergency resuscitation equipment, monitoring equipment, EKG machine, and laboratory, radiology, dietary, operating room, and laundry supplies and equipment.

RESPONSIBILITIES:

Preparatory Period

1. Plan to provide for the medical needs of Fremont County residents and evacuees during the relocation period, including inpatient, outpatient, and emergency medical care.
2. Develop a patient classification scheme so that able patients can be discharged and the hospital population reduced rapidly during crisis relocation.
3. Plan to staff the PDH with allocated personnel; expand hospital bed capacity by locating the PDH at the hospital or at a nearby school.
4. Establish contact with other health care facilities in Fremont County, e.g., nursing homes and hotels; assess the possibility of converting them to temporary hospitals during crisis relocation.
5. Estimate the drugs, medical supplies, and equipment required to provide medical care for the patient load anticipated during crisis relocation.
6. Establish procedures with the Deputy Coordinator, Medical Care, and the H/M Coordinator to receive medical supply allocations for the State

and other jurisdictions.

7. Recruit blood donors to maintain acceptable levels in the blood bank.
8. Assist the Fremont County Red Cross and Nursing Service, as appropriate, in instructing the public in the principles of first-aid and in preparations for the rest area first-aid stations.
9. Plan, in cooperation with other h/m service units, for the use of allocated personnel, medical supplies, and drugs.
10. Conduct training exercises for hospital employees to improve their emergency medical competency and efficiency.
11. Cooperate with ambulance services and encourage the training of emergency medical technicians.
12. Prepare and maintain a list of hospital employees, their addresses, and telephone numbers.
13. Maintain all equipment at required levels of performance.

Relocation Period

1. Provide medical care during the crisis relocation period, including in-and outpatient and emergency services.
2. Discharge all able patients to the care of families, friends, or other responsible parties to reduce the inpatient census.
3. Notify employees that crisis relocation has begun and advise them to report to their assigned duty stations.
4. Set up the PDH at St. Thomas More Hospital or at a nearby school and convert other facilities to temporary hospitals, as indicated.
5. Notify the Deputy Coordinator, Medical Care, of any personnel or supply shortages.

6. Assist the Fremont County Red cross and Nursing Service in establishing a first-aid station at each of the two rest areas, as feasible.
7. When crisis relocation is over, return to normal operations as conditions allow.
8. Identify problems encountered throughout the relocation period so that they may be addressed and planned for in revisions of the Fremont County CRP, H/M Service Annex.

DEPLOYMENT:

St. Thomas More Hospital employees will staff the PDH.

Appendix 4
Fremont County Nursing Service

ORGANIZATION:

Public Health Nurse: Mrs. Madeleine Randall

REQUIREMENTS:

Immunization supplies, health education materials, water analysis equipment, vector control equipment, laboratory material, food establishment surveillance equipment.

RESPONSIBILITIES:

Preparatory Period

1. Plan, in cooperation with the Fremont County Sanitation Officer and the State public health nursing and environmental health consultants, for the provision of public health and environmental sanitation services during crisis relocation.
2. Determine, in cooperation with the sanitation officer, the personnel, supply, and equipment required in the event crisis relocation should occur; communicate the requirements to the Coordinator, H/M Service.
3. Plan for the utilization of allocated personnel, supplies, and equipment in providing the following services:

- Monitoring water supplies
- Communicable disease surveillance and control (including immunization, as appropriate)
- Vector control (insect and rodent)
- Laboratory services related to disease diagnosis, treatment and control
- Public health nutrition services
- Monitoring food service establishments
- Surveillance of sanitary conditions in housing (especially congregate care facilities)
- Monitoring solid waste disposal
- Monitoring sewage disposal
- Keeping and safeguarding vital statistics
- Health education (emphasizing disease prevention and promotion of health)
- Staffing first-aid stations (utilizing public health nurses)

4. Evaluate the communicable disease status in Fremont County and report to the H/M Coordinator.
5. Prepare health instructions and advisories emphasizing communicable disease prevention and control and environmental sanitation for distribution during crisis relocation.
6. Recruit and train individuals as public health aides to assist during crisis relocation.
7. Determine the status of existing drinking water supplies, garbage and waste disposal facilities; identify additional resources, e.g., St. Joseph Hospital has an emergency water supply.

Relocation Period

1. Utilizing resident and allocated personnel, supplies, and equipment, carry-out the following operations during the relocation period:
 - Inspect lodging facilities, water supplies, food supplies, sewage systems, garbage disposal systems, hospitals, institutions, and other public facilities
 - Vector control
 - Immunization programs, as needed
 - Communicable disease surveillance
 - Health education
 - Staff first-aid stations
2. Request additional supplies from the H/M Coordinator.
3. When crisis relocation has ended, step-down operations as the situation warrants.
4. Assess the communicable disease status of relocatees leaving Fremont County and advise the El Paso County-Colorado Springs H/M Coordinator accordingly.
5. Return unused supplies and equipment.
6. Identify and evaluate problems that occurred during crisis relocation and revise the public health section, of the Fremont County H/M Annex accordingly

DEPLOYMENT:

The Deputy Coordinator, Public Health, will be located at the Fremont County Courthouse.